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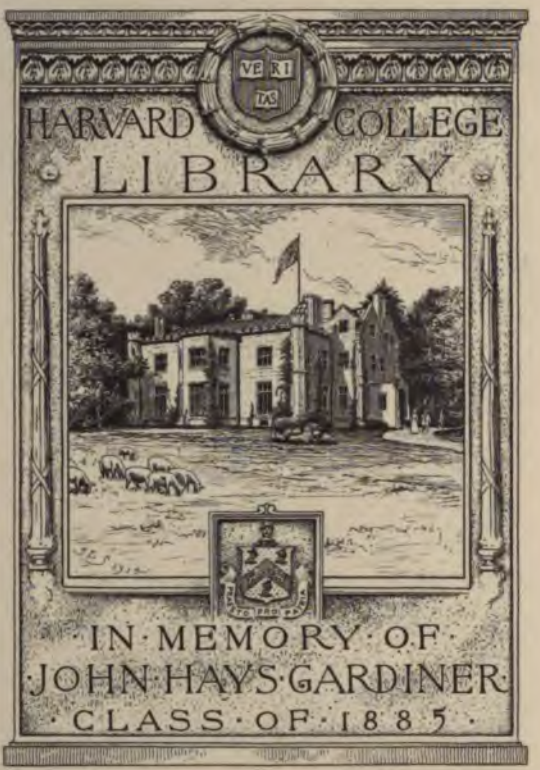
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A HISTORY OF CAVALRY

FROM THE EARLIEST TIMES,

or

An Ode to Impetuosity.

With Lessons for the Future

BY

COLONEL GEORGE T. DENISON

LATE COMMANDING THE GOVERNOR-GENERAL'S BODY-GUARD, CANADA
AUTHOR OF "MODERN CAVALRY," "SOLDIERING IN CANADA," "THE STRUGGLE FOR IMPERIAL UNITY," ETC.

SECOND EDITION

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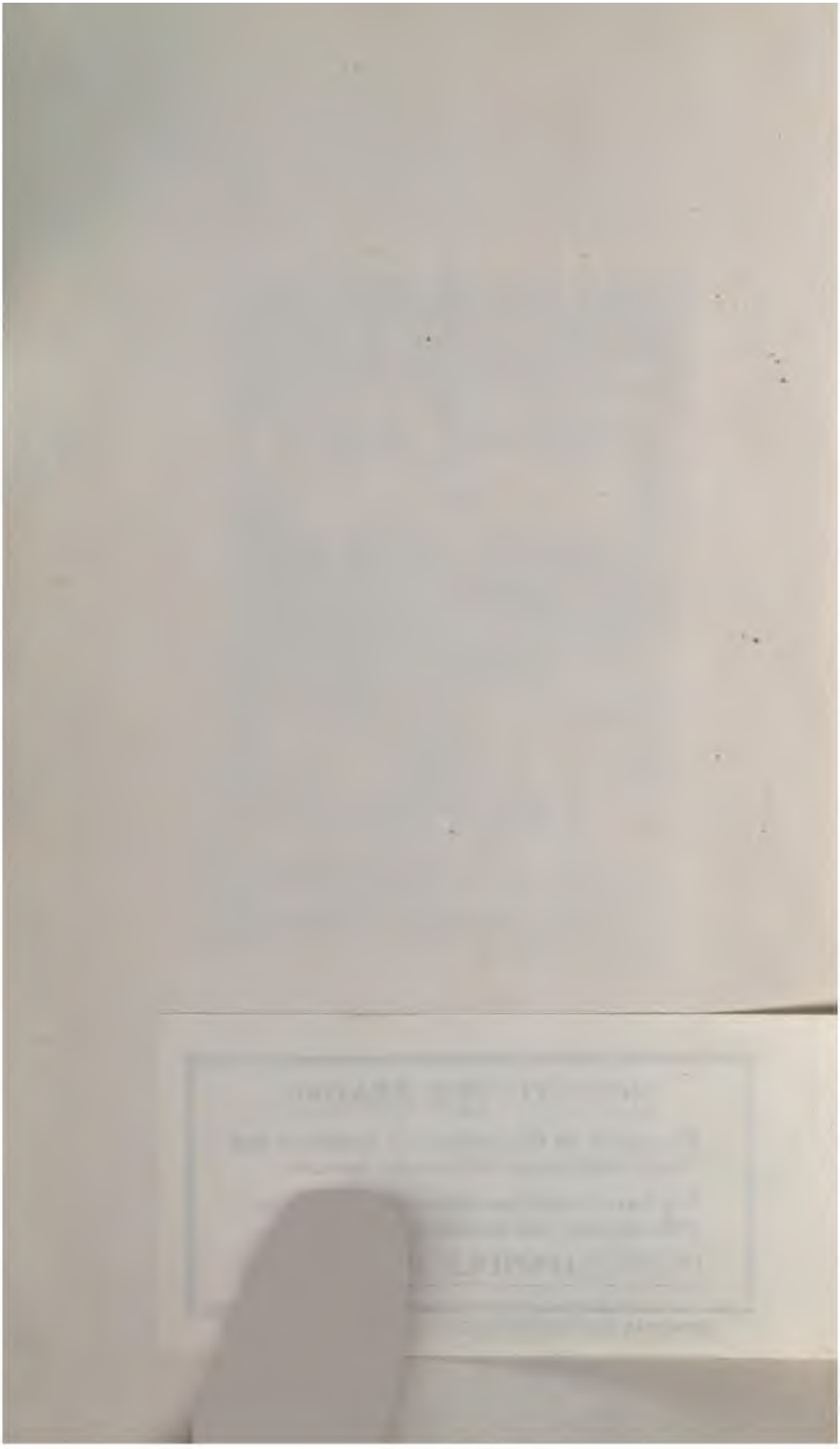

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SECOND EDITION

MACMILLAN AND CO., LIMITED
ST. MARTIN'S STREET, LONDON
1913

(73)

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RICHARD CLAY AND SONS, LIMITED,
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TO HIS MAJESTY

ALEXANDER II.,

EMPEROR OF RUSSIA,

THROUGH WHOSE MUNIFICENT ENCOURAGEMENT

IT HAS BEEN WRITTEN,

THIS BOOK IS,

BY EXPRESS PERMISSION, RESPECTFULLY

Dedicated.

PREFACE TO THE FIRST EDITION

A SPECIAL history of the cavalry service has never, I believe, been written in any language. This fact attracted the attention of His Imperial Highness the Grand Duke Nicholas, Inspector-General of the Russian cavalry, and feeling that so important a subject deserved the closest study, he laid the matter before the Emperor of Russia, and in the year 1874, with His Imperial Majesty's sanction, offered three prizes for the three best books on the history of that service. The competition was thrown open to the officers of all foreign armies.

As it has been intimated to me that the commission appointed to deal with the matter have no objection to my doing so, I now publish the English edition of my work without awaiting a decision.

In the following pages I have recorded all the striking features in the history of the cavalry service from the earliest period to the present time. I have commenced with the earliest use of the horse in war, and have endeavoured to lay clearly before the reader the various changes that have taken place, and the causes that have led to them, throughout the long period which has elapsed since the horse was first used in the war chariot. The sixth or concluding section is devoted entirely to deductions which are drawn as to the probable use of cavalry in the future.

I take this opportunity of acknowledging the great assistance I have received from the admirable programme which was issued as a guide to intending competitors by the Russian government. I have also to express my thanks for the courteous permission cheerfully accorded to me by the authorities in St. Petersburg to take to my rooms books from the magnificent library of the General Staff. To Count Heyden, Chief of the Staff, and to Captain Schenchine of the General Staff, my thanks are especially due. To Major-General Gorloff, Aide-de-Camp to His Majesty the Emperor

of Russia, and Military Attaché to the Russian Embassy in London, I am under deep obligations for information and assistance kindly given me.

To B. Homer Dixon, K.N.L., of Homewood, Toronto, I owe the advantage derived from the opportunity of studying, in his splendid collection of arms and armour, the system of armament during the period of chivalry. I have also to thank Goldwin Smith, Esq., M.A., for his kind assistance in reference to several points in classical history.

To the library of the Royal United Service Institution I am also indebted, my thanks being specially due to T. D. Sullivan, Esq., late 56th Regiment, the librarian.

GEORGE T. DENISON.

HEYDON VILLA, TORONTO.

PREFACE TO THE SECOND EDITION

THIS book was first published in London in March 1877.—As mentioned in the Preface to that edition, it had been prepared to compete for the Emperor of Russia's Prize offered for the best History of Cavalry. Permission was given me to publish the English edition without waiting for the decision.

In September, 1877, I received notification from the Russian Authorities that it was decided that I should receive the first prize of 5,000 Roubles, which was forwarded to me shortly after.

The book was also translated into German by Colonel Brix of the Prussian General Staff, and published in Berlin in 1879.

Over thirty-six years have elapsed since the publication in London in 1877 and for about thirty years the book has been out of print, and of late years very difficult to obtain. As it is, I believe, the only general history of the Cavalry Service that has been published in any language, and as history does not change, I am having it reprinted exactly as it originally appeared, without note or alteration. The concluding period on "The Organization, Armament and Employment of Cavalry in Modern Warfare," is the only portion upon which comment need be made, and that can be dealt with in this Preface.

Thirty-six years ago the prejudice among the professional cavalry officers against the use of firearms by cavalry was universal and very extreme. As the principles laid down in Chapter XXXII of my book were based upon the use mainly of the rifle and the revolver, and as in 1877 the idea was comparatively new, very little attention was paid by the British cavalry to doctrines so opposed to all their teaching and traditions. I had predicted that in the next great war, "whichever nation employed mounted rifles extensively would be found winning decisive campaigns by the wise

adoption of a necessary reform." This was only a repetition of what I had said in my book on "Modern Cavalry," published in 1868.

The experiences of the subsequent wars, the Boer war of 1899–1902 and the Russian-Japanese war of 1904, have confirmed in a remarkable degree the necessity for the adoption of modern firearms by the mounted soldier, and have completely vindicated the soundness of the principles which I advocated.

The Boer war was a most illuminating experience, and throws a great light upon the advantage of the mounted rifle principle in modern war. When the British forces were sent to South Africa in 1899, the infantry predominated, a small number only of cavalry regiments being sent, armed with swords or lances and depending mainly upon those weapons. The colonies offered contingents to assist the Mother Country and were at first requested to send infantry alone and not horsemen. The traditions of the wars of Frederick and Napoleon dominated the ideas of our military leaders.

The war began on the 11th October, 1899. The British force consisted mainly of infantry and artillery, in addition to a few regiments of the old type of cavalry. On the other side the Boers had an army of mounted riflemen, with an effective artillery. Our army suffered a long series of defeats at first. Lombard's Kop, as well as, Stormberg, Magersfontein and Colenso (the black week) will not be forgotten by the British people for generations. The tide was turned afterwards by the energetic use of cavalry or mounted rifles. General French, our best cavalry general, broke through the Boer lines at Klipdrift by a charge of horsemen, and relieved Kimberley; but Cronje with his army would have escaped had it not been that General French rapidly retraced his steps, passed the flank of Cronje's retreating army, and seizing Koodoesrand Drift, cut off his retreat, held him by fire action, and so ultimately caused his surrender.

There has been in the last few years some interesting literature upon the question as to whether cavalry in the future should depend upon fire action, or upon the "*Arme Blanche*." Probably the most important work is by General Von Bernardhi of the German army on *Cavalry in Future Wars*, published first in 1899, and a second edition in 1902, translated by Charles Sydney Goldman, and published in English in 1906, with an introduction by General Sir John French. This was followed by a very able criticism in *War and the Arme Blanche*, a book written by Ernest Childers, the

editor of Volume V of the *Times'* "History of the War in South Africa." This has a very interesting introduction by Lord Roberts, and was published in 1910. Contemporaneously with the publication of *War and the Arme Blanche*, General von Bernardhi published in Germany another book translated by Major Bridges, under the title *Cavalry in War and Peace*. This English edition also contained a Preface or Introduction by General Sir John French. This led Mr. Ernest Childers to write another critical work in reply, entitled *German Influence on British Cavalry*.

These books with the writings of Colonel Henderson, Sir Ian Hamilton, and Count Wrangel, enable one to gather the opinions of the best authorities of the day on the disputed question of the effect of the improved fire arms on cavalry in contrast with the principle of the *arme blanche*. When my History was published in 1877, almost all cavalry officers were opposed to the mounted rifle principle, which I advocated so strongly. I wish now to show how the South African War, and the Russian Japanese War, have modified the opinions of the foremost cavalry leaders and writers.

The late Colonel Henderson, speaking of the German cavalry during the war 1870–71, says "The troopers knew nothing whatever of fighting on foot. Their movements were impeded by their equipment, and a few *Franc-tireurs* armed with the chassepot were enough to paralyze a whole brigade." And again, "Should not the cavalry, confronted by new and revolutionary conditions, have sought new means of giving full effect to the mobility which makes it formidable?"

Lord Roberts, in his Introduction to Mr. Childers' book, is also very clear and definite in his views about the rifle as the arm for mounted men; speaking of the Boer War he says, "As however it was the first war in which magazine rifles were made use of and as the weapon used in future wars is certain to be even more effective on account of the lower trajectory and automatic mechanism about to be introduced, shall we not be very unwise if we do not profit by the lessons we were taught, at such heavy cost, during that war?"

Referring to Mr. Childers' statement, that the cavalry theory so far as it was based on the *arme blanche* had collapsed Lord Roberts says, "Why did our cavalry fail? Because they did not know, because they had never been required to know how to use the principal and most useful weapon with which they were armed." Again speaking of General French's admirable movement at Klip Drift he says, "It was a rapid advance of warriors, who possessed the ability by means of horses and rifles (not swords and lances) to place their enemy

hors-de-combat. It was an ideal cavalry operation, but it was not a 'cavalry charge,' as this term is generally understood, and the *Arme Blanche* had nothing to say to it."

Again Lord Roberts says, "But after reading Mr. Childers' book, backed by my own practical experience, I am driven to the conclusion that the only possible logical deduction from the history of late wars is, that all attacks can now be carried out far more effectually with the rifle than with the sword."

Mr. Childers own opinions are very definite and fully expressed in his books on the *Arme Blanche*, and on *German Influence on British Cavalry*, and show in the clearest terms the result of the experiences of the Boer War. He says, "The example of the American Civil War had no effect upon Continental tactics, a blind imitation of which has always been the besetting sin of our own cavalry school. Thirty-four years later, when the rifle had enormously increased in power, we pitted ourselves against the born shots and hunters of the Veld, with as little regard for the cavalry lessons of the American Civil War as though it had never been fought." "And yet the war gradually became a mounted war." "It was by their skill in the use of the horse and rifle combined that the Boers were enabled to defy us so long." "The war was always a mounted war, because the Boers were all mounted." "And even among our cavalry, reliance upon the carbine and upon the support of mounted riflemen, intensified with every day of hostilities." In fact "the cavalry, like the irregulars, acted throughout as mounted riflemen."

Speaking of the operations in Natal after Colenso, Mr. Childers says, "Sword and lance were out of court. Every responsible person at the time realized this fact. Short as we were of mounted troops, nobody would have dreamed of asking for more troops, trained to shock, on the ground that shock was either requisite or possible." And when Lord Kitchener assumed the chief command in November, 1900, after the Boers had had the benefit of one year's experience, he says he had to cope with, "What beyond all question now, was the most formidable type of soldier in the world—the mounted rifleman." Referring to good leaders, Mr. Childers says, "Good leading never came from any other source than oblivion of steel methods, and unreserved reliance upon the rifle." Again he says, "It was patent to everybody—leaders and men—that the Boers were formidable because they were good mounted riflemen, and that our bitter need was for mounted riflemen as good as theirs."

The influence of the mounted rifle principle in the South African War is shown more forcibly than in any other way,

by the change in the composition of our army—which was extraordinary. At first, in Natal, in addition to a small force of about 3,000 steel-armed cavalry of the old type, our army mainly consisted of infantry and artillery, and it was announced that mounted men were not wanted, but in June, 1901, the total mounted British force was about 80,000 men, the total strength of the whole army, 244,000. At the end of the war there must have been 100,000 British mounted men in the field, while the whole army was about 250,000. The Boers from first to last had a grand total of 87,365—practically all mounted riflemen.

Mr. Childers mentions several instances of mounted charges by the Boers with the rifle, for they had no steel weapons. Once at Komati River, the Boers, firing from the saddle, charged clean through a rear guard of Canadian mounted troops. At Springhaan's Nek (14th December, 1900) the Boers burst through the Thabanchu line of fortified posts, in like manner to the charge of Sir John French at Klip Drift. Another charge at Geduld is also mentioned. At Vlakfontein (30th May, 1901) the Boers, under General Kemp, charged against a rear guard of British troops, burst through, and rode down the Yeomanry screen and cut to pieces the company of infantry and the gun detachments. One hundred and fifty of our men fell, killed or wounded in a very short space of time, while the Boer losses were very slight. "The Boers for the most part remained in the saddle, and fired from it, until they reached close quarters. After dismounting some dropped the rein altogether and some advanced, firing with the rein over the arm. There was no shock or any idea of shock in this or any other instance of the charge. The lean, under-sized Boer ponies were incapable of it. Shock is incompatible with the destructive use of the rifle, and this was a massacre with the rifle, short, sharp, and murderous."

Another striking instance of fire action was at Bakenlaagte (30th October, 1901). "Botha, ordered a charge upon Colonel Benson's rearguard. The Boers shouting and firing from the saddle, swept over a mile and a half of ground, overwhelming the company of infantry, catching and capturing the rearmost, or covering sections of mounted riflemen, and stopped just short of the crest of an elevation, afterwards known as Gun Hill, where the guns and the remainder of the mounted riflemen had hurriedly taken post. Here the Boers flung themselves from their ponies and engaged our men at close quarters (barely thirty yards' distance) on foot. The resistance they met with was

magnificent. The defending force had to be almost exterminated, before the hill was won, and the guns captured."

Mr. Childers also deals with the Russo-Japanese War. He says, "What happened?" "Not a single charge against riflemen on foot. The lance and sword nowhere. In combat the rifle was supreme, banishing the very thought of the sword, even from the minds of those who carried it, and inspiring the only effective action for cavalry as for infantry." "Few as the achievements of the Russian Cavalry were, whatever they did achieve was through fire action."

Count Wrangel of the Austrian Cavalry Service, who wrote a book on *Cavalry in the Russo-Japanese War*, gives some valuable information on the subject. He says one must admit "that the prevailing conditions made it extraordinarily difficult for the cavalry masses of Kuropatkin to play the part of cavalry in battle. Indeed we do not mind openly declaring that, in our opinion, no other European cavalry, supported by the cavalry tactics of the day, would have been in a position to perform anything of note on the Manchurian battlefields." Again Wrangel says, "The Japanese cavalry, scarcely without exception, carried out their performances with the carbine and in close touch with their own infantry." Mr. Childers also says that "Sir Ian Hamilton contrasts South African mounted men and methods with Manchurian men and methods, and his conclusion is unreservedly in favour of the rifle."

General von Bernardhi, the foremost German writer on cavalry matters, is an upholder of the *arme blanche* and the shock, but, in spite of that preconceived idea, is yet forced to see the increased importance of fire action. He says, "the employment of dismounted action now-a-days has gained in importance to such an extent that the whole character of our activity appears completely changed." "Now-a-days numerous problems will present themselves to the cavalry, which can only be solved by fire action." "In future, quite apart from encounter with the enemy's cavalry, our own horsemen will find tasks before them which will make appeal to the rifle inevitable." "In case of anticipating an enemy at a defile, the rifle will be practically the only weapon that can find employment." "Even a determined cavalry will have to make use of their fire arms almost every day; indeed, without adequate employment of their carbines, they are no longer able to carry out the most important of their incumbent duties." Again, speaking of dismounted action, he says:

"In spite of the increased importance this form of fighting

has acquired in modern war, our cavalry has not yet paid anything like the amount of attention to the subject that it deserves. Almost everywhere it is treated as of quite minor importance, and many cavalrymen still close their eyes to the view that, without a training at once as thorough and earnest for dismounted action as that bestowed on the arm to fit it for its mounted duties, modern cavalry will hardly survive the trials it will encounter in the future. This idea rests on long-standing tradition which is difficult to overcome."

The opinions of all these high authorities, Lord Roberts, Colonel Henderson, Sir Ian Hamilton, General von Bernardhi and Mr. Childers, and the practical experiences of the recent wars, all confirm the opinions I expressed on cavalry fire action in this book in 1877. Thirty-six years of consideration and study of modern wars have not varied my views, or modified them in any way.

There is one error in the original edition I wish to correct. In Chapter XXIII I describe the capture of the Dutch fleet when frozen in the ice at Texel in 1795, by a force of French Hussars. I followed the authority of Jomini, Lacretelle, Alison and other historians. General F. de Bas, the well known Dutch historian, has, however, satisfied me that the fleet was handed over to the French cavalry by order of the Dutch Government, and that it was not a capture or a military operation at all.

GEORGE T. DENISON.

HEYDON VILLA, TORONTO.
March, 1913.

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A HISTORY OF CAVALRY

INTRODUCTORY CHAPTER.

IT seems to be established by Scripture that in the earliest times human society commenced practically by a group of families; that in the infancy of the world the patriarchal government alone sufficed, and that there were no wars on account of the sparseness of the population, the abundance of pasturage and animals of the chase, and the close relationship that existed in the race for a considerable time.[1]

The first cause of strife arose, in all probability, from contention for the best fields for pasture, and for the possession of the most available springs and streams. As families multiplied, and population became more dense, the causes of strife increased in the same ratio. At a time when almost everything was in common, and the rights of property had not been defined, the hunters and shepherds seeking to supply their wants were apt to encroach on the rights and properties of their neighbours. Aggression naturally produced resistance and retaliation, families calling their relatives to their aid, until numbers would be engaged on each side, and deadly feuds lasting for generations would be originated.

These conflicts and feuds naturally led to families uniting into tribes for mutual protection, and the same cause in time led to the formation of great nations. Ambition then became added to the causes of war, assisted by the love of excitement, the fanaticism, and the patriotism of peoples.

It seems probable that offensive weapons were discovered, and in use, long before being required in warfare, for in the very infancy of the world man must have had means of defending himself against wild beasts, as well as of killing those animals which were necessary for his sustenance. The club

[1] Lord Arundel of Wardour. Tradition.

has probably been the first weapon invented, soon after the pointed stick used as a pike or javelin, and then came the successive improvements of the point hardened by fire, the pointed bone, the sharpened stone or flint-head, and lastly, of the brass, iron, or steel points as used in the lance of modern times.[1]

The knife, as one of the earliest needs of man, must have been soon invented. When lengthened and sharpened it became a poignard, and the step is short from the poignard to the sword.[2]

As to projectile weapons, stones thrown by the hand were without doubt the first weapons of this character, and they were still in continual use as late as the Trojan War. Then perhaps came the simple club, thrown by hand also, and after that the stick sharpened at the point, and thrown as a javelin. In increasing the range of these missiles, and aiding the natural force of the human arm by extraneous means, the sling was probably the first invention, followed by the bow, the ballista, and the catapult.

The use of projectile weapons was necessarily closely followed by the invention of defensive armour, to protect the warrior from missiles that could not be warded off by hand-to-hand weapons. The shield or buckler made of wood, or the skins of beasts, was probably the first piece of defensive armour; cuirasses and helmets of leather came into use next, and soon afterwards copper and iron must have been used in their construction.

When numbers of combatants became gathered together for the purpose of attacking their enemies, or of defending themselves against aggression, they would at once perceive the importance of some order being observed, and to secure this they would see the necessity of electing one or more chiefs to whom strict obedience should be accorded. As numbers increased, subdivisions in command would be made, and the rules regulating the method of discipline and fighting would become more numerous and complicated.

At this period in the history of war it is evident that strength, activity, and endurance, combined with skill in the use of weapons, were the great qualifications for a soldier, and that the skilled warrior who had the greatest amount of endurance was likely to be the most successful. He therefore who, encumbered with defensive armour, had a long distance to march before coming to close quarters with his adversary was at the disadvantage of being partly out of breath at the commencement of the conflict. This has in all probability

[1] De Galland, 3, 4, 5. [2] Ibid. 2, 3.

been the cause of the first employment of the horse in war. It has soon been perceived that the soldier who could be carried without fatigue and placed fresh upon the spot where he would be obliged to exert every energy in deadly conflict, would have a great advantage in a hand-to-hand struggle over one who had been obliged to march heavily laden for a long distance. This evidently led to the invention of chariots of war.

Some writers have held that chariots were invented for the sake of the advantage gained to the warrior by his being elevated or dominating over his opponent. The earliest records, however, prove clearly that such could not have been the intention, as the chariots were used simply to carry the most distinguished chiefs to meet the enemy. On approaching the foe, the warrior, after throwing his projectile weapons, alighted to engage in a hand-to-hand combat, while the charioteer turned the chariot for flight, and waited near with his horses' heads facing the camp. The warrior, if wounded or hardly pressed, could then conveniently retreat to his chariot, which was open to the rear, and low to the ground, and leap in and be carried to the safety of his own lines.

Had the idea of dominating over the enemy been the object of the use of the chariot, it is evident that the shape would have been very different, that it would have been much higher, and parapeted all around and projectile weapons alone used from it. When Cyrus invented chariots for this purpose some hundreds of years after the ordinary war-chariot had been in constant use, he caused them to be made upon a totally different principle. Homer, however, is very clear indeed upon this point, and gives many instances of the method of using them at the siege of Troy.

In the fourth book of the Iliad, speaking of Agamemnon, he says, "He left his steeds indeed, and his brass variegated chariot, and these his servant Eurymedon, son of Ptolymeus, the son of Pirais, held apart panting. Him he strictly enjoined to keep them near him against the time *when weariness should seize his limbs commanding over many.*"[1] In the same book, Diomede, when entering the battle, having called upon his friend Sthenelus to come and be mindful of impetuous valour, "from his chariot leaped with his arms upon the earth, and dreadfully sounded the brass on the breast of the prince as he moved rapidly along."[2]

The method of fighting at the siege of Troy appears to have been of a very desultory and irregular character. The chief warriors who had chariots were called the cavalry or horse-

[1] Iliad, iv. 226. [2] Ibid. iv. 420.

men, and were placed in the front line. The worst soldiers, in whom there was least reliance, were placed in the second line, while the phalanx of foot-soldiers, the main stay of the battle, formed the rear or third line.[1] On approaching the enemy, the chiefs endeavoured in the first place to wound or slay their opponents by throwing javelins with brazen points. Upon coming closer, they were accustomed to stretch out and strike with the long spear from the chariot. They then dismounted and the real struggle took place on foot.

The weapons used were mainly brass-pointed lances or spears, and swords. The defensive armour was of brass, and they carried oxhide shields. A description of Ajax's shield in the seventh book of the Iliad[2] shows it to have been covered with seven layers of oxhide, and an outside or eighth layer of brass. The weapon most used was the spear, the sword being merely an auxiliary arm. In the account of the battle in the latter part of the fourth book of the Iliad, the style of fighting is clearly depicted, and one incident in that description illustrates plainly the relative uses of the sword and spear. "But him Ætolian Thoas struck, rushing on with his spear, and the brass fastened in his lungs: Thoas came near to him, and drew the mighty spear out of his breast, then he unsheathed his sharp sword and with it smote him in the midst of the belly, and took away his life."[3]

Again, in the seventh book, in the combat between Ajax and Hector, the struggle began with spears, then they threw huge stones with the hand at each other, and at last in close quarters, fought with their swords till stopped by the heralds.[4]

While this kind of struggle was going on the charioteers of either party had their chariots near, ready to carry away to the safety of the camp or lines those warriors who became wearied or wounded, or sorely pressed. The warrior retreated, fighting, to the chariot, and after mounting defended the rear of it while the driver urged the horses out of the conflict. The critical moment at which the chief endeavoured to leap upon the chariot was often fatal; for there are many instances in Homer where death overtook them in the act, as for instance, in the beginning of the fifth book of the Iliad, where Idomeneus killed Phœstus. "Him, just as he was mounting his chariot, spear-famed Idomeneus with his long lance wounded in the right shoulder, he fell from his chariot and hateful darkness seized him."[5]

The chariot was simply used for the purpose of rapid conveyance, and there is no evidence in Homer of it being in

[1] Iliad. iv. 296. [2] Ibid. vii. 225. [3] Ibid. iv. 527.
[4] Ibid. vii. 245. [5] Ibid. v. 45.

itself used as an offensive weapon, nor is there any record of horses being mounted and made use of for the saddle. In the fifteenth book of the Iliad, in a simile, Homer refers to a man mounting horses in driving them from pasture, and vaulting from one to another as a feat creating surprise; which leads to the inference that horsemanship as an art was almost unknown in his day.

It is asserted by Père Amyot that chariots of somewhat the same style as those mentioned in Homer were in use in China as far back as 2600 B.C., and that cavalry also were in use about the same time in that country.[1] It is difficult to say, however, whether these statements are based upon reliable evidence. The Chinese pride themselves greatly upon their antiquity, and one is apt to fancy that some of their history is like the Welsh gentleman's pedigree, which contained a note opposite the name of the tenth or twelfth member of his family, to the effect that about this time lived Adam in the garden of Eden.

Chariots were used in India at a period more remote than the siege of Troy. In Egypt also chariots were in use in the eighteenth century before the Christian era, or more than five hundred years before the Trojan war. When Joseph was taken into favour by Pharaoh, he made him ride in the second chariot which he had,[2] showing that chariots were in use for some purpose at that early date. This is the earliest mention of the use of the horse in history.

At the time of the exodus of the children of Israel from Egypt, Pharaoh "made ready his chariot and took his people with him, and he took six hundred chosen chariots, and all the chariots of Egypt, and captains over every one of them,"[3] and pursued after the Israelites with "all his horses and chariots and his horsemen and his army."[4]

It is somewhat doubtful whether Pharaoh had any cavalry properly so called, for the horsemen mentioned in connection with the chariots were probably the men who fought in them and managed the horses, and not horsemen in the modern acceptation of the term. Horsemen are not represented on Egyptian monuments, even upon those of a later date, while chariots are continually represented. This seems to prove that when the custom of engraving monuments and monumental tablets first arose, there were only in use in armies chariots with their combatants and attendants, and foot-soldiers, but no cavalry, for in depicting armies the artist would certainly have illustrated all three branches of the

[1] Bardin, article Cavalerie. [2] Genesis xiv. 28. [3] Exodus xiv. 6, 7.
[4] Ibid. xiv. 9.

service if there were so many. It is just possible that after generations of artists had been representing armies by chariots and foot-soldiers alone, conventional rules of art may have arisen, which have prevented the representation of real horsemen for many years after they were actually in general use.

In reference to the difficulty of the word horseman being applied to charioteers, it is quite easy to understand how, *before* the introduction of cavalry, it would be applied to the only species of force connected with horses, particularly when the word is used to distinguish men fighting on chariots from those on foot.

At the same time it is not impossible that when horsemen really came into use, the same word might be applied to signify cavalry which had formerly been used to designate the men who fought in the chariots and managed the horses. The Hebrew word had evidently different meanings, for it sometimes is used to indicate the horses themselves irrespective of their attendants or riders. As the same word is used to designate cavalry in the later books of the Bible, when cavalry were employed in great numbers, it has led commentators to translate it in the same way throughout; but there is no doubt that all the external evidence tends to show that there were no real cavalry in the time of Moses.

In the Assyrian sculptures chariots appear first, and as horsemen come into use they also are represented. It is strange that cavalry could have been in use in Egypt without any positive evidence appearing in the inscriptions, especially when we remember how complete their sculptured records are.

It is impossible to fix with any certainty the period of the first use of the war-chariot, although it is certain that the account in Genesis (ch. xli., v. 43) 1715 B.C., is the earliest historical evidence we have of the use of the chariot for any purpose, as Exodus xiv. 9, is of their use for purposes of war.

Virgil and Pliny both attribute their invention to Erichthonius, the fourth king of Athens, who is said to have died in 1437 B.C. This is contradicted by the testimony of Moses, as to their use in 1715 and 1491 B.C.[1] The Canaanites also used iron chariots in 1444 B.C.[2] The Syrians used them against King David in 1037.[3] The Assyrians used war-chariots as far back as the reign of Tiglath Pileser I., who lived about the year 1120 B.C.[4] The early representations of these chariots show that at first they were small and low to the

[1] Judges i. 19. [2] Joshua xvii. 18. [3] 1 Chronicles xix. 18.
[4] Rawlinson, Ancient Monarchies, i. 423.

ground, with wheels of six spokes. They were usually drawn by two horses, sometimes by three, but never by four. The third seems to have been attached with a thong or rope on one side or the other, and must have been intended as an extra or spare horse, to supply the place of one that might be killed or disabled.[1]

The Assyrians used the bow and arrows almost entirely in their chariots,[2] two quivers, crossed diagonally, appear on the outside of the body of the car, which is low, not rising more than about three feet.[3] The warrior or archer had a charioteer who managed the horses, and if a chief of distinction, had also an attendant who carried a shield and protected him while he was using the bow. In a few cases where the king is represented, or some personage of very high condition, two guards are shown protecting the monarch on either side with circular shields.[4] A spear was also fixed in a socket in the side of the chariot as a reserve weapon. The warriors seem to have usually fought with their bows from the car, but they sometimes alighted, and moved to the front of the horses, to enable them to shoot their arrows with better and steadier aim.[5] The attendant in this case also alighted, and protected his chief with the buckler or shield.

In the later chariots the wheels were much higher and the body raised about a foot above the axle, so that the chief while in it dominated over the field, and had an advantage over any assailant attacking him on foot. The warrior also carried a small sword suspended at his left side with a strap, but he is never represented as using either it or the spear which was always at hand.

Isaiah describes the Assyrians in his day (760 B.C.) as a people "whose arrows are sharp and all their bows are bent, whose horses' hoofs should be counted like flint, and their wheels like a whirlwind."[6] The allusion to the hoofs being like flint is interesting, as showing the great value that must have been placed on sound hoofs, in an age when shoeing had not been invented.

Xenophon tells us that the Assyrians used their chariots in the front line somewhat as they were used in the Trojan War, and that the warriors dismounted and fought as skirmishers on foot in advance of the army, evidently using their bows and arrows.[7] On the near approach of the enemy, they mounted their chariots and retired to their own lines. The foot-archers, the javelin men, and the slingers, then dis-

[1] Rawlinson, Ancient Monarchies, i. 409. [2] Ibid. i. 421. [3] Ibid. i. 413.
[4] Ibid. i. 412. [5] Ibid. i. 421. [6] Isaiah v. 28.
[7] Xenophon, Cyropædia, iii. 3, 60.

charged their weapons at the advancing foe, and lastly, the heavy armed infantry, the main force of the army, became engaged in close conflict.

Cyrus the Great, king of Persia 559 B.C., was one of the first military reformers, and if any reliance can be placed upon the history of his life by Xenophon, the art of war must have been much advanced by his wise improvements. The Cyreneans were accustomed to fight from their war-chariots and to remain in them in the field, although the chariot was simply used to convey the warrior, and does not ever appear to have been itself employed as a weapon or engine of war.[1] The people of Medea, Syria, Arabia, and other parts of Asia, used them in the same way, and it is evident that they simply performed a species of skirmishing duty in front of the army covering its advance, the warriors in them using missile weapons only, but never coming to close quarters, and retiring when the javelin men and heavy-armed infantry came into action.

The Trojan way of managing chariots has already been described, and these two methods were alone in use in the time of Cyrus.

Cyrus seems to have perceived a great waste of power in both these systems, and to have been the first to endeavour to use the momentum of the weight and speed of the horse and chariot, as an offensive (we may almost say projectile) weapon. He held the opinion that when the bravest of the men were mounted upon chariots, men who naturally constituted the chief strength of the army, they acted the part only of skirmishers at a distance, and contributed nothing of any importance to the attainment of victory. He saw that 300 chariots required 300 combatants, and 1200 horses, and that the drivers were picked men in whom the warriors could best confide, and there were three hundred of them who did not do the enemy the least harm.[2]

He therefore abolished both these methods of using them, and invented a new sort of chariot, with wheels of great strength so as not to be easily broken, and with long axletrees to prevent it being overturned. The driver's seat was like a turret of strong timber. The driver himself was covered to the eyes in complete armour, and could manage the horses by reaching over the seat which came up to his elbows.[3] The axletrees on each side of the wheels had steel scythes attached about three feet in length, and others below pointing to the ground, evidently to prevent an enemy

[1] Xenophon, Cyropædia, vi. 1, 27, 28, 29.
[2] Ibid., vi. 1, 27, 28, 29, 30. [3] Ibid. vi. 1, 29; vi. 2, 17.

seeking safety by falling down and allowing the chariot to pass over. The horses were also clad in armour, with forehead pieces, breastplates, and sideplates, and the whole formed an engine intended by its momentum to break through the line of the enemy, and create loss and confusion in his ranks.[1] Cyrus himself equipped 100 chariots in this manner; his ally, Abradatus of Susa, provided 100 more, and Cyrus persuaded Cyaxares to alter another 100 of the Medean chariots from the Trojan and Libyan form to his new pattern, so that at the battle of Thymbra Cyrus had 300 chariots armed with scythes.[2] They did good service, and according to Xenophon, charged with impetuous fury upon the heavy masses of the enemy, closely followed by the infantry, who rushed in and cut to pieces those whom the chariots had thrown into disorder.[3] The success of the invention was so great, that the scythed chariots were retained in use for many generations by the successive kings of Persia.[4]

The ancient Britons used war-chariots against the Romans. They drove them among their enemies, throwing javelins until they had penetrated their ranks, when they dismounted and fought as infantry, the drivers taking the chariots out of the *mêlée*, and placing them within reach of their masters, to be ready in case they found themselves too closely pressed. Cæsar speaking of them says, "Thus these barbarians had the agility of cavalry, and the steadiness and firmness of infantry," and he bears strong testimony to their skill and usefulness in war.[5]

Herodotus mentions the Zaveces, a nation of Africa, bordering upon the Maxyan Libyans, among whom it was customary to employ the women to drive the chariots.[6]

[1] Xenophon, Cyropædia, vi. 1, 50; vi. 4, 1. [2] Ibid. vi. 2, 7, 8.
[3] Ibid. vii. 1, 31, 32. [4] Ibid. vii. 1, 47. [5] Cæsar, Com. iv. 33.
[6] Herodotus, iv. 193.

PERIOD I

TO THE FALL OF THE WESTERN ROMAN EMPIRE

CHAPTER I

EARLIEST CAVALRY

SECTION I.—SCYTHIAN AND ASSYRIAN CAVALRY.

IT is impossible to fix the period at which cavalry, in the proper sense of the word, were first used. They were not known in Greece at the time of the Trojan War, or when Homer wrote, or some evidences of it would have appeared in his writings. There is no satisfactory record of such a force in the Bible until after the time of David, but when Herodotus wrote they were generally in use in Asia, and had been in use for a long time.[1] It is generally supposed that horsemen fighting as cavalry and riding on horseback came into use about 120 years after the Trojan War, but this is merely an approximate conjecture.[2]

It is very probable, although there is no historical evidence of it, that the Scythians were the first people to use the horse to ride upon. Living a nomadic life, upon great plains, in a country where horses existed in great numbers, where the climate and soil were favourable to their increase and maintenance, and subsisting as the Scythians did principally upon their flocks and herds, they would naturally at a very early period discover the use of the horse for equestrian purposes. Once the custom was originated, but a very short time would elapse before it would be universal, and before the whole people would become so habituated to riding as almost to live upon horseback.

They were evidently very skilful with horses, and continu-

[1] Herodotus, i. 79.

[2] Bardin, 1097.

ally in the habit of mounting them, long before the Greeks had conceived the idea of men riding upon horses at all, for it is clear that the fable of the Centaurs was originated by the Greeks having seen or heard of the horsemen, whom they mistook for single animals half-man and half-horse. This would be the most natural idea of a non-riding nation in reference to a people who were continually on horseback. The Scythians do not appear to have used chariots of war at all, so that all the evidence seems to point to them as the earliest cavalry nation, unless indeed reliance can be placed upon the statements of Père Amyot in reference to the Chinese.

Their weapons were bows and arrows. The arrow-heads, according to Herodotus,[1] were brass or bronze, although Ammianus Marcellinus,[2] describing the same people 800 years afterwards, says that the arrow-points were of bone. Besides their bows and arrows they used lances, knives, and battle-axes. They wore bronze breastplates, and were good archers and excellent riders.[3]

The Scythians fought tumultuously, without any fixed order, in groups of triangular shape, firing their arrows at a distance, and retreating if attacked, but rarely if ever coming to a close hand-to-hand combat.[4] By this system they wearied their enemies out, and a force invading their country was continually in a species of investment, which ever pressed upon them, but against which a crushing blow could not be delivered. There was no art and but little organisation among them, the most skilful chiefs being the foremost in leading them into action.[5]

Recent researches into the monumental tablets and inscriptions of Assyria, as well as the close study of late years given to the bas-reliefs and other sculptured remains which have been discovered, have thrown great light upon the early history of the Assyrians, as well as upon their manners and customs. These discoveries enable us to follow with much accuracy the origin and development of the cavalry service, and the consideration of them will be the more interesting as they are the only records we have of the first conception and subsequent growth of that arm.

Cavalry do not appear to have been used in Assyria before or during the reign of Tiglath Pileser I. who ascended the throne in 1120 B.C., or shortly after the Trojan War. This is shown by the fact that in a long inscription by him cavalry are not referred to, while chariots are repeatedly mentioned.

[1] Herodotus, iv. 81. [2] Ammianus Marcellinus xxxi. 2.
[3] Rawlinson's Parthia, 119. [4] Carrion Nisas, i. 79. [5] Ibid. i. 79.

Assur-izir-pal reigned in the year 885 B.C. In the sculptures of his time chariots appear in great numbers while there are very few instances of cavalry, showing that they were a new force not much understood and but little used.[1] Later on, in the years 722 to 705 B.C., in the representations of the reigns of Sargon and Sennacherib, the cavalry have largely increased, and are continually shown in the scenes of battles, while the king alone, or but very few of his nobles, appear to make use of the chariot.

At first the cavalry horses are very peculiarly equipped; they wear a head-stall, a collar, and a string of beads; the trappings being almost the same as those in use by the chariot horses of the time. They use the same kind of bit, being a heavy species of snaffle, with the same straps and ornaments. The collar, which is highly decorated, is curiously arranged around the neck about half-way up.[2] It is hung round with pomegranates and tassels. The cavalry soldiers ride without any saddle.

It is strange that these cavalry should have had their horses equipped in exactly the same way as those used in the chariots, even so far as to have the collar, which could have been of no use to a horseman. It may have happened in the outset that on occasions where the warriors desired to move upon ground where their chariots could not be driven, they may have been in the habit of detaching the horses from the car and mounting them, probably, for instance, to follow a flying foe over broken ground.

Their seat in the earliest figures is very remarkable; the knees are drawn up as high as the horse's back, and are pressed close against the neck and withers, the legs and feet being naked and hanging close to the shoulder. This shows that the mounting of the horse was a new idea, and that they had not as yet discovered the proper and natural way of sitting. These cavalry represent the very earliest idea of mounted soldiers. This is shown by the fact that the horseman, whose chief weapon is the bow, is accompanied by an attendant also mounted, who is without any offensive weapons and wears a skull-cap and tunic, and whose sole duty seems to be to hold and guide the horse of the mounted archer while he is discharging his arrows. This strongly supports the assumption that the horses in these times must have been taken from the chariot—the soldier riding upon one and the charioteer whose duty it was to manage the horses riding the other and guiding and directing both. Horsemanship must have been in its very infancy when a practice such as that

[1] Rawlinson, Ancient Monarchies, i. 423. [2] Ibid. i. 424.

described was in use. The archer, who was clad in an embroidered tunic and a pointed helmet, besides his bow carried also a sword and shield, but there is no instance of these weapons being depicted in actual use.[1]

After this type of horsemen the next period shows many changes. The cavalry are of two kinds, part being archers and the other spearmen, and great advances have been made in the art of horsemanship. A pad or cloth, either square or the shape of a modern saddle-cloth, has supplied the place of a saddle. It is usually fastened by a single girth, although sometimes a breast-strap and a species of crupper are also used.[2] The headstall and breast-leather are very highly ornamented. There is a marked improvement in the seat of the riders in the later sculptures; the seat on the horse is much more correct and graceful, and so much have they improved in the management of their horses that the attendants are no longer seen, but the soldiers control their chargers unaided. The spearmen hold their reins in the left hand and use the spear in the right, while the mounted archer boldly lays his reins on his horse's neck while he discharges his arrows; the horses evidently being trained to stand still or to continue at speed without the use of the bridle. The collar sometimes is shown and is sometimes wanting, which seems to intimate that it began to be used, as already suggested, through the horses being temporarily detached from the chariots, that it was retained at first from habit, and afterwards simply for ornament, for it seems to have been highly decorated.

The uniform of the horsemen is also improved. They are well clothed in tunics ornamented with a fringe around the skirt, a broad belt round the waist, and sometimes one across the shoulder bearing a short sword, tight-fitting trousers with a laced boot and the pointed helmet complete the dress.[3] The arms are bare from the elbow. Later, in the reign of Sennacherib, 705 B.C., the cavalry were equipped with a coat of mail covering the whole body, leather breeches, and jack-boots or greaves, the costume being worn by both archers and spearmen.[4] The archers used bows about four feet long, firing arrows about three feet in length which were carried in a quiver on the back. Sometimes the spearmen had bows which were carried slung across the shoulder as a reserve weapon in case of the spear being broken.

In the reign of Essarhaddon, 681 B.C., the cavalry bowmen were still further protected by large saddle-cloths or coverings,

[1] Rawlinson, Ancient Monarchies, i. 424. [2] Ibid. 425. [3] Ibid. i. 426. [4] Ibid. 427.

which were united to a breastpiece, and which extended to the rear, so as to cover the greater part of the horse. This, which was made of hide or thick felt, must have been a great protection against ordinary missile weapons.

Herodotus[1] says that Cyaxares the Mede was the first to organise "the Asiatics into cohorts, dividing them into spearmen, archers, and cavalry."[2] King Cyaxares died in 585 B.C., after reigning 40 years. Sennacherib lived about 100 years before him, and in his time, if not before, the Assyrians were organised in distinct corps. In the sculptures of his reign are found bodies of cavalry on the march unaccompanied by infantry—engagements where cavalry alone are fighting the enemy—long lines of spearmen marching in double file, and sometimes divided into companies, and archers drawn up together in companies, each distinguished by its own uniform.[3] The slingers also are shown together, and all clothed and armed alike.

SECTION II.—PERSIAN CAVALRY.

Cyrus the Great made many improvements in the Persian army, and, if Xenophon is to be believed, was the originator or founder of the Persian cavalry. His desire of having a force that could pursue rapidly a broken and retreating foe was the moving cause which led him to organise a mounted corps.[4] His idea at first was not to use the momentum of the horse to aid in an opening attack, but more to harass and cut off the retreat after the infantry had defeated the enemy's masses. He armed them and their horses with breastplates, and the men with lances that could either be thrown or held in the hand. He did away with the bows and javelins and the custom of skirmishing at a distance, and in fact organised a heavily-armed force of lancers, and trained them for hand-to-hand fighting. He formed them in squadrons of 100 in front and 8 in depth.[5]

At the battle of Thymbra Cyrus feared to risk his horsemen against the Lydian cavalry of Crœsus, who were very skilful in the use of the long lance and managed their horses with admirable address. He consequently gathered all the camels that were with his army carrying provisions and baggage, and mounted upon them men in cavalry accoutrements. He placed these in the first line, commanded his infantry to follow, and his newly-organised cavalry were all

[1] Herodotus, i. 103. [2] Lemprière, Classical Dictionary, Cyaxares.
[3] Rawlinson, Ancient Monarchies, i 462.
[4] Xenophon, Cyropædia, ii. 1; iv. 3, 9 to 15. [5] Bardin, Milice Perse.

placed behind the infantry, showing that he had not yet learned to place much reliance upon his horsemen. By this stratagem the horses of the Lydian cavalry, alarmed at the appearance and smell of the camels, wheeled round and recoiled in confusion, and although the Lydians dismounted and engaged valiantly with the infantry of Cyrus, after a hardly-contested struggle they were defeated.[1] Xenophon, in his account of this battle, gives much credit to the Persian cavalry, but the account above, which follows closely the text of Herodotus, is likely to be the more truthful.[2]

After Cyrus the cavalry became the most important part of the Persian armies. They were very heavily armed, both men and horses, in iron and brass, and so laden with it as to be able to compete with difficulty with horsemen more lightly equipped.[3] They were accustomed, as were the Assyrians, to fetter their horses at night,[4] a pernicious habit which rendered them useless in case of a surprise, and rendered intrenchments around the camp a necessity.[5]

When Xerxes invaded Greece, 480 B.C., he had in his army 80,000 cavalry, besides camels and chariots. Among them were 8,000 Sargatians, a nomadic race of Persian extraction, armed with lassoes and daggers only. Their mode of fighting was to throw the lasso at a distance, and having entangled their enemy they drew him towards them and despatched him with the dagger.[6] The Median cavalry wore sleeved breastplates, with iron scales like a fish. They carried bucklers made of osiers, short spears, long bows and arrows, and a dagger upon the right thigh. The Cissians were similarly equipped. The Caspian cavalry wore goatskin mantles, and carried bows made of cane, and cimeters.[7] The Libyans, clad in leathern garments, made use of javelins hardened by fire, and all rode in chariots. The Arabians, in cloaks fastened with a girdle, with long bows carried on the right side—all rode camels; they were stationed in the rear, away from the rest of the cavalry, that the horses might not be frightened.

In this war the cavalry were used, as in later times, for in the battle or skirmish at Mount Cithæron, just before the battle of Platæa, the Persian cavalry charged in squadrons, their general Masistius, in a golden cuirass, leading the advance.[8] When he fell, his followers, attempting to recover the body, cheering one another on, pushed their horses to the

[1] Herodotus, i. 79, 80. [2] Xenophon, Cyropædia, vii. 2, 46. [3] Duparcq, 27.
[4] Xenophon, Cyropædia, iii. 3, 24, 27. [5] Xenophon, Anabasis, 100, 101.
[6] Herodotus, vii. 85. [7] Ibid. vii. 84 to 87.
[8] Ibid. ix. 20 to 24.

charge, and a sharp struggle of a hand-to-hand character took place.

At this time, also, the Persian cavalry understood equally well the skirmishing order of fighting, and used their missile weapons with great effect in harassing and wearying their enemy.[1] Mardonius sent his mounted archers to attack the Grecian army shortly before the battle of Platæa. They rode up shooting arrows and hurling javelins, but refusing to enter into a close engagement. This action of the Persian cavalry caused great distress to the Greeks, and compelled them to move their position, and appears to have been the cause of bringing on the battle of Platæa.

About 100 years later, when Xenophon served in Persia under Cyrus the younger, the scythed chariots were still in use as well as the cavalry both heavy armed and light. At this time the leaders or generals used both chariots and saddle-horses. Cyrus was riding in his chariot when the enemy were reported advancing; he immediately leaped from the car, put on his breastplate, and mounting his horse, took his javelin in his hand, and gave the orders for the marshalling of his army.[2] He had 600 chosen cavalry as a body-guard, all armed with breastplates, thigh-pieces, and helmets; their horses had defensive armour on the forehead and breast, and the horsemen carried swords. At the battle of Cunaxa he charged with his 600 horse against the guard of 6,000 who were stationed in front of the king Artaxerxes, put them to flight, and killed their commander Artagerses with his own hand; the fighting being evidently close hand-to-hand work. Tissaphernes, who commanded the cavalry of Artaxerxes in this action, charged with his horsemen through the Greek peltasts. The Greeks opened their ranks and cut down the horsemen with their swords and hurled their javelins at them, which proves that the cavalry must have ridden boldly on.

After the death of Cyrus the younger, Xenophon describes how the 10,000 Greeks suffered from the want of cavalry, being harassed by the Persian bowmen, archers, and slingers, who, keeping at a safe distance, hurled their missiles upon the heavily armed Greeks, and if attacked, retreated swiftly, shooting backwards as they rode.[3] Xenophon organised a small force of cavalry with the baggage horses. They were provided with leathern jackets and breastplates, and were most serviceable in the retreat.

In the war between Darius and Alexander the Great, the Persians still retained the war-chariots, which seem to have lost their effect to a great extent by the skill with which the

[1] Herodotus ix. 49, 50. [2] Xenophon, Anabasis, i. 8, 3. [3] Ibid. iii. 3, 7.

soldiers of Alexander attacked and evaded them. The cavalry were very numerous, and consisted of heavy-armed horsemen, who fought at close quarters with both swords and lances, and light cavalry, who used bows and arrows and javelins, and depended entirely upon harassing their opponents with their missile weapons.

CHAPTER II.

THE GREEK CAVALRY.

SECTION I.—ATHENIAN AND THESSALIAN CAVALRY.

THE Greeks were not the first people to employ cavalry in war. The want of pasture, the rocky and mountainous character of the country, and its general inadaptability to the use of the horse, naturally led them to depend at first entirely upon their infantry, and prevented for a long period that extensive use of horsemen which was so common at an early age among the Scythians, Persians, and Assyrians.

The earliest war of which mention is made in Greece, that of the seven chiefs against Thebes, in 1225 B.C., is so evidently a mere fiction that no useful information can be obtained from the records of it. The evidence, as far as it goes, however, shows that cavalry were not in use at that period. The next war in the order of time of which we have any historical account is the siege of Troy, which occurred forty years later, about 1184 B.C. Homer has given a very full and detailed account of this war, and enables us clearly to understand the arms and method of warfare of his age. He shows us plainly that although the Greek chieftains had adopted the chariot as an engine of war, and used it in the same manner as their opponents, yet that cavalry proper were entirely unknown as a military force to both the contending armies.

It is a most probable conjecture that the war chariot was an invention of the inhabitants of Asia Minor, or Egypt, and was adopted by the Greeks in imitation of them. Herodotus says expressly that the Greeks learned to yoke four horses abreast from the Libyans.[1]

The Thessalians were without doubt the first in Greece to use cavalry, and most probably made use of them long before they were known in Greece proper. The plains of Thessaly

[1] Herodotus, iv. 189.

were covered with abundant pasturage, the climate as well as the soil was admirably suited to horses, and in that province they must have been more numerous and vigorous than in most countries. Virgil says that the Lapithæ, a people of Thessaly, first mounted on horseback, applied the reins, turned the horse in the ring, and taught the horsemen under arms to spurn the plain.[1]

The Thessalians, being the first to use cavalry, the other nations naturally turned to them to secure troops of that description to aid them in their wars. We find when the Pisistratidæ had usurped the government of Athens and banished the Alcmæonidæ, that these latter secured the aid of the Lacedæmonians, who sent a large force by sea to attack Athens. The Pisistratidæ, hearing of the intended invasion, sent to Thessaly and obtained the assistance of 1,000 cavalry. Relying mainly upon these troops, the Athenian tyrants cleared all the plains of the Phalereans and made the country practicable for cavalry, and when the Lacedæmonians landed the Thessalian mercenaries were sent against them. They charged upon them vigorously, killed large numbers, including Anchimolius the general, and drove the survivors into their ships, and so ended the first expedition. On the second attempt some time afterwards, the Lacedæmonians were more fortunate and defeated the cavalry, who, discouraged by the loss of some forty men, immediately departed for Thessaly.[2] After this time we constantly hear of the Thessalian and Thracian cavalry in the wars in Greece, down to the time of Alexander, when they formed some of the finest regiments of cavalry in his army.

Plutarch states, upon the authority of Philostephanus, that Lycurgus was the first organiser of the Spartan cavalry, that he formed them in troops of fifty each who were drawn up in a square. This is doubtful, however, for Plutarch goes on to say that Demetrius the Phalcrean says that Lycurgus never had any military appointment, and that there was the profoundest peace when he established the constitution of Sparta. There is the corroborative evidence of Xenophon in his "Treatise on the Lacedæmonian Government," where he states that Lycurgus divided the army into cavalry and heavy armed infantry, six companies of each.

Sixty years after Lycurgus, in the first Messenian war, 743 B.C., cavalry were used. According to Pausanias, the Spartans and Messenians had each 500 horsemen and light armed troops.[3] In one of the battles the heavy armed phalanges were separated by a ravine, and could not come to

[1] Virgil, Georgics, iii. 115. [2] Herodotus, v. 63, 64. [3] Maizeroy, 43, 44, 45.

close quarters, while the cavalry and light armed troops alone were engaged. In another conflict, he says that the cavalry on both sides were very few in number, and did nothing memorable, and he adds that the people of the Peloponnesus were not skilful at that time in the use of cavalry, which probably accounts for the fact, that in the last action of the war, which took place at the foot of Mount Ithome, there appears to have been no cavalry on either side.

Among the early Greeks, the mounted service was not popular, for they paid but little attention to their cavalry, and had very few of them in their armies. Those who were wealthy and able to furnish horses were compelled to do so, but they were accustomed to give the horses to substitutes who were also enrolled to serve, while the wealthy citizens themselves served on foot in preference. The whole confidence was placed in the phalanx of heavy armed infantry, and though often defeated through the want of cavalry, they did not for a long time supply the deficiency.[1] They endeavoured to give the required assistance to the phalanx by means of light armed infantry who fought with javelins, slings, and bows and arrows. The archers, though never numerous, were very useful in action.

The small force of cavalry that was maintained was necessarily most inefficient. The men did not own the horses they rode, and consequently were not accustomed to them, so that we may safely assume that they were badly drilled and individually unskilful in the use of weapons on horseback. When therefore the Greeks had cavalry in the field they were generally too weak both in numbers and discipline to be divided upon the two flanks, and were consequently placed upon one flank or in front to open the action, or what was more common, in the rear to act as a reserve. This was the usual method among the Greeks from the Messenian war until the invasion of the Persians under Xerxes. The Thessalians were the only nation that were attached to the use of cavalry, and of all the Greeks they alone preferred serving in it rather than in the infantry.

When the decisive battle took place at Marathon, which settled the fate of the first Persian invasion, the Athenians had ten thousand heavy armed infantry, all spearmen. Their allies the Platæans, one thousand strong, were similarly armed, but neither of them had cavalry or archers. The Persians had large numbers of horsemen, and were well supplied with archers. Miltiades adopted two precautions to guard his army as much as possible from the Persian horse,

[1] Maizeroy, 46.

for he evidently felt strongly the importance of counteracting the influence of the hostile cavalry. In the first place, he extended his line so as to prevent his flanks being turned by the enemy's horse, which usually fought on the two wings, weakening his centre considerably in order that the flanks might be safe; his next step was to abandon the usual slow pace of the phalanx, and to lead on his men at a run, partly to take the Persians by surprise, but principally to get into action before the cavalry could mount and form up and manœuvre against him.

The system among the barbarians of fettering their horses in camp was no doubt known to Miltiades, and he was governed in his movements accordingly. We have no record in Herodotus of the Persian cavalry taking part in the battle although he states that they landed at Marathon, because the ground was favourable to the use of horsemen. Miltiades protected his flank, as already mentioned, by extending his line so as to rest on marshes which at the season of the year at which the battle was fought were impracticable for cavalry, and the hurried and impetuous attack most probably gave the horsemen no time to equip themselves or their chargers, or to form their ranks so as to take part in the action.[1]

At Thermopylæ no cavalry appear to have been used on the side of the Greeks, but Xerxes had 80,000 horsemen as well as 20,000 Libyans and Arabians who used chariots and camels. Herodotus says that the Greeks resolved to await the invader in Thermopylæ, having weighed everything beforehand, and having considered that the barbarians in that position "would neither be able to use their numbers *nor their cavalry*."

After the return of Xerxes to Persia, and when the Greeks marched through the Isthmus to attack Mardonius, there is no mention made of any cavalry in their army. The Persians, however, not only had large numbers of their own cavalry, but the Thebans, who were in alliance with them, furnished a force of cavalry which seems to have been very effective, and to have done good service in the skirmishes before the battle of Platæa, as well as in covering the retreat after it.

It is hard to explain how it happened that the Greeks had no cavalry in their army, while those Greek nations who had joined the Persians and were fighting with them furnished horsemen who evidently were very skilful in the management of their horses and weapons. It may have been caused by the extreme confidence that the Greeks had in their heavy armed infantry, and their desire, in an important conflict, that

[1] Creasy, Marathon.

their whole force should be of that type which they considered the most useful. There is another solution more probable still, and the fact of the Greek nations in alliance with Mardonius furnishing cavalry is strongly corroborative of it, namely, that the Persian cavalry were so numerous and so skilful that the small force of horsemen that it would be possible for the Greeks to raise could not expect to withstand them; while they would be obliged to remain in the plains and in situations where the Persian cavalry could get at them. By having no cavalry whatever, and confining their efforts to organising a powerful infantry, they knew they would have an army which, unencumbered with horsemen, could operate on broken ground, and by keeping among the mountains, neutralise that portion of the Persian army that gave to it its great strength. The circumstances all favour this theory. Mardonius moved out of Attica, because it was not suitable for his cavalry, and marched to Thebes, where the neighbourhood was adapted to the use of that force.[1] This shows the reliance he placed upon his horsemen.

The Greeks marched from Eleusis to the foot of Mount Cithæron, and formed up there, avoiding the plain. Mardonius sent his cavalry under Masistius to attack the Megarians, who alone of the Greeks, to the number of 3,000, held an advanced post in the plain.[2] The Megarians were soon reinforced by large bodies of Greek infantry. Herodotus says that the Persians charged the Greeks in squadrons and did them much mischief. Masistius was killed in the struggle, and the fight swayed backwards and forwards over his body; the cavalry charging at speed, and being firmly met and charged in turn by the heavy armed infantry, who drove them off the field, and retained the body of the dead general.[3] Nothing could show the admirable qualities of the Greek infantry better than the firm manner in which they met the finest horsemen of their age.[4]

The Persian cavalry seem to have been energetic and enterprising, and to have performed the duties particularly pertaining to cavalry in a very effective manner. The Greeks were continually receiving large reinforcements as well as provisions by the passes of Cithæron that lead to Platæa.[5] Mardonius detached a party of cavalry in the night to make a detour, in the hope of striking a blow at the communications of his enemy. Upon issuing on the plain these horsemen came upon a convoy of 500 beasts carrying provisions from Peloponnesus to the Grecian army. They immediately attacked

[1] Herodotus, ix. 13. [2] Ibid. 20, 21. [3] Plutarch, Aristides.
[4] Herodotus, ix. 23. [5] Ibid. ix. 38, 39.

and captured the convoy, killing many of the escort as well as of the beasts, and carrying off the remainder to their own lines. This is probably as early a record as there is of cavalry being detached in this way to operate upon the enemy's rear.

The mounted archers were, of the Persian army, the greatest annoyance to the Greeks. They harassed them by riding up and hurling javelins and arrows, but carefully avoiding a close engagement.[1] These cavalry cut them off from the river Asopus, so that the Greeks were much distressed for want of water. Their attendants, who were sent to Peloponnesus to get provisions, were also shut out by the cavalry and unable to reach the camp. For a while they were in a most dangerous position, and were obliged to consult how to get away to an island on the Asopus, where they hoped to be free from the attacks of the cavalry.[2] They resolved to march in the night, that they might not be seen, and that the enemy's horse might not follow and annoy them.

This brought on the battle of Platæa, which resulted in a complete victory for the Greeks.[3] The Bœotian cavalry did good service to the Persians in covering the retreat.[4] The Theban cavalry fell in after the battle with the Megarians and Phliasians who were coming up to join the Greek army, and charged upon them.[5] Herodotus says they threw down and killed six hundred of them, and drove the rest headlong to Mount Cithæron. The whole account seems to give the idea that the charge was pushed home, and vigorous in its character.

In this war, the Greeks so felt the want of an effective force of cavalry, that in the first general assembly of the Athenians, held after the retreat of the Persians, Aristides proposed to raise in Greece 10,000 infantry and 1,000 cavalry, and 100 vessels to be maintained to carry on the war against the barbarians.[6]

After this period the Greek cavalry was soon put upon a more efficient footing, and in the next conflict of which we have a detailed and complete account, that is to say the Peloponnesian War, the cavalry exercised an important influence. At the opening of the war the Athenians had 13,000 heavy armed infantry, exclusive of garrisons, and 1,600 on the guard of the city; "they had, including the archers that were mounted, 1,200 horsemen, 1,600 archers and 300 triremes fit for the sea."[7] The cavalry were not of a good quality, however, for in two skirmishes in the first year

[1] Herodotus, ix. 49. [2] Ibid. 51. [3] Ibid. 62, 63.
[4] Ibid. 68. [5] Ibid. 69. [6] Plutarch, Aristides.
[7] Thucydides, book ii., year 1.

of the war they were defeated and shut up in Athens.[1] In the third year of the war, in a battle under the walls of Spartolus, although the heavy armed infantry of the Athenians defeated the heavy armed Calchideans and drove them into the town, the horse and light armed Calchideans got the better of the horse and light armed troops of the Athenians, and so harassed the Athenian army in their retreat with missile weapons as to cause great loss, without coming to close quarters at all.[2] This proves that up to this date the Athenian cavalry had not acquired any reputation, and could not compete with the horsemen of Macedonia or Thessaly.

In the seventh year of the Peloponnesian War we see that the Athenians had transport ships, especially to convey cavalry, and that two hundred horsemen were carried by sea in the attack made that year upon Corinth. Thucydides, speaking of the battle which ensued, says that the advantage to the Athenians from having this small body of horse, while their opponents had none, gave them the victory.[3]

At the battle of Delium, 424 B.C., Pagondas won the victory by means of two troops of horse that he despatched around a hill to fall upon the rear of the Athenians, who were till then victorious.[4] The Athenians, imagining a fresh army was coming up, were struck with consternation and utterly defeated and driven off the field. In this battle the cavalry and light armed troops of both armies were ranged upon the two wings. At the first battle of Mantinea, in 418 B.C., the cavalry on both sides were placed upon the wings in line with the heavy armed infantry, but they do not appear to have exercised any important influence in the battle.[5]

At this epoch we see mention made for the first time of the custom of attaching an infantry man to each horseman. Thucydides says that the Bœotians assembled at Phlius, shortly before the battle of Mantinea, consisted of 5,000 heavy armed, 5,000 light armed, and 500 horsemen, each attended by a soldier on foot. These attendants were drilled to fight with the cavalry. Each horseman had his own foot soldier, who fought near him, and served and aided him, if occasion required.[6] This same kind of force was in use afterwards among the Germans, where the foot-soldiers followed the cavaliers, running and holding on to the manes of the horses.

In the expedition against Syracuse, the Athenians were much embarrassed by the want of cavalry, and in their first battle they were obliged to adopt an entirely new formation

[1] Thucydides, book ii. year 1.
[2] Ibid. book ii. year 3.
[3] Ibid. book iv. year 7.
[4] Ibid. book iv. year 8.
[5] Ibid. book v. year 14.
[6] Maizeroy, 54.

to counteract the effect of the powerful cavalry of the Syracusans. The Athenian army was drawn up with one half in a first line of eight in depth, the remainder also eight deep, formed in a hollow square with the train and equipage of the army in the centre.[1] The Syracusans were drawn up sixteen in depth. After a hard conflict, the Athenians were victorious, but were unable to follow up the victory on account of the enemy's cavalry, which effectually covered the retreat.

As their army suffered so much from the want of a mounted force the Athenians sent them the following spring to Catana 250 horsemen with all the equipments, but without horses, which were afterwards obtained in Sicily, from the Egestians and Cataneans, and by purchase from neighbouring nations.[2]

During the Peloponnesian War, the Spartans being much depressed at their losses at the island of Sphacteria, and the occupation of Cythera by the Athenians, contrary to their usual maxims organised among themselves a body of four hundred horse and archers.[3] Prior to this time they had depended upon their allies, such as the Thebans and Phocians, to furnish what cavalry they required in their expeditions outside of Peloponnesus.[4]

The Greeks had in their armies three species of cavalry, the "Cataphractes" (*κατάφρακτης*), the "Greek," and the "Tarentine." The heavy armed, called the Cataphractes, were not much used. They wore a casque which covered half the face, and protected the neck and ears,[5] a cuirass of plates of iron or horn in scales, which covered the body in front and rear, while the thigh and right arm were protected by hide covered with plates of metal.[6] The horses also were provided with defensive armour; the horsemen wore boots and spurs, and their weapons were the lance, the long sword, and sometimes the javelin.

The tactical unit was the "ile" (*ἴλη*), a troop of sixty-four horses.[7] The order of formation varied at different times and among the different nations. The Thracians formed the "ile" in the shape of a wedge with the point towards the enemy. The Thessalians ranged two "iles" in the shape of a lozenge, of which one point faced their opponents.[8] The other Greeks, who also sometimes used the lozenge, formed up the "ile" in a square or rectangle, the four rear ranks acting as a reserve.[9] Under Epaminondas the "ile" was divided into four sections of sixteen horses each ranged four

[1] Thucydides, book vi. year 16. [2] Ibid. book vi. year 18. [3] Ibid. book iv. year 8.
[4] Maizeroy, 58. [5] Rocquancourt, 1, 54. [6] Carrion Nisas, 1, 87.
[7] Rocquancourt, 1, 58, 59 [8] Humbert, 20, 21. [9] Carrion, 80, 81.

in front by four in depth,[1] but the most common formation of the "ile" was sixteen in front by four in depth:—Two "iles" of 64 horses each formed an "epitarchie;" two "epitarchies" formed a "tarentinarchie" of 256 horses; two "tarentinarchies" formed a "xenagie" or "hipparchie" of 512 horses; two "hipparchies" formed an "ephipparchie" of 1,024 horses; two "ephipparchies" formed a "telos" of 2,048 horses; two "telos" formed an "epitagme" of 4,096 horses.

There was in use among the Greeks another species of cavalry more lightly armed, called the "Greek," who carried only the lance and the sword, and whose horses were not protected with armour.[2] They wore casques similar to those worn by the Cataphractes, a corselet of tanned leather or a coat of mail, a buckler, and boots and spurs.

The medium, or "Greek" cavalry, so called from being the species most commonly used in Greece, were divided into three different types, called "*δορυφόροι*," "*κοντοφόροι*," and "*λογχοφόροι*." These names arose from the differences in the length or shape of the lances, and the manner in which the different corps used them. They were lightly armed, but sufficiently so to close with the enemy in fighting with the lance and sword. Some of them carried bucklers but not all.[3] The *δορυφόροι* used lances a little longer than those used by the *κοντοφόροι* or *λογχοφόροι*: the last two used shorter lances which they used both for thrusting and throwing. There was a cord attached to the shaft, so that after throwing it the horseman could pull it back again for further use.

The "Tarentine," or light cavalry, were not regularly organised. They were sometimes armed with javelins and sometimes with bows and arrows. They charged with the sword or battle-axe, carried a small buckler as a defensive arm, and sometimes wore corselets of tanned leather.[4] The lightest cavalry used darts or javelins thrown from a distance; and some were even trained to throw missiles to the rear while in flight after the manner of the Parthians. They never came to close quarters as they were too lightly armed to stand the shock. The mounted archers were also reckoned in this class, the Cretans surpassing all the other Greeks in the use of the bow on horseback.[5] The term "*ἀκροβόλισται*" was applied generally to all those who fought in this manner from a distance.

The position occupied by the cavalry in action was not fixed by any arbitrary rules, but depended somewhat upon

[1] Bardin, article "Ile." [2] Humbert, 21. [3] Maizeroy, 69.
[4] Duparcq, 48, 49, 51. [5] Maizeroy, 68.

the nature of the ground. The Tarentine, or light cavalry, intermingled with light infantry, was sometimes placed in front of the "Greek" or medium cavalry, sometimes upon its wings.[1] The Cataphracts, who were held in reserve until the battle was fairly joined, then charged the enemy, and opened a road for the others who followed up a success and completed the victory.

The cavalry of the Greeks used neither saddles nor stirrups, nor were their horses shod. The cavaliers either mounted their horses bare-backed, or placed upon them a light rug, or mat of skin, or cloth upon which they sat.

The Athenians recruited and maintained their cavalry with much more care than did the Spartans. They kept up a force of 1,200 horse, each of the ten tribes furnishing 120 cavaliers with the phylarch, who being chosen by the tribe commanded the contingent. When united, the whole force was placed under the orders of two hipparchs who were elected annually to the command.

The Spartans, who did not value cavalry, had a small force only, and even these were chosen from among the least vigorous of their people, and those of the lowest *moral*. Xenophon says that at the battle of Leuctra "the Lacedæmonian cavalry was at that time in a very inefficient condition, for the richest men maintained the horses, and when notice of an expedition was given the men appointed came to ride them, and each taking his horse and whatever arms were given him proceeded at once to the field, and thus the worst and least spirited of all the men were mounted on horseback."[2]

At this battle the Theban cavalry were only about 500 in number, but were veteran troops well organised and drilled, and rapid in their movements. They at once fell upon the Lacedæmonian cavalry, defeated them and drove them in confusion upon the ranks of their infantry, and prepared the way for the heavy Theban phalanx with which Epaminondas hurled his decisive blow upon the right wing of the Spartan army.

At the battle of Mantinea, 363 B.C., the principle upon which Epaminondas ranged his troops was similar to that at Leuctra, the left wing being refused instead of the right. His cavalry on his right wing were formed in a strong wedge-like body, with companies of foot supporting them. To the left of his army, on some high ground, he posted a portion of his cavalry with parties of infantry interspersed among them to hold in check the Athenians who were on the right of the

[1] Rocquancourt, i. 54. [2] Xenophon, Hellenics, 496.

Lacedæmonian army. His plans were crowned with complete success; the cavalry on his right overthrew the cavalry opposed to them, and drove them from the field. The mass or phalanx with which he made his attack on the left of the enemy broke through the line and won the victory. The Athenian cavalry on the right being held in check by the superiority of the Theban squadrons, took no part in the fight.[1]

SECTION II.—GREEK CAVALRY UNDER PHILIP AND ALEXANDER.

The squadron of the Scythians, Thracians and the Macedonians had a triangular form, and was called a wedge or spur; Philip King of Macedon, father of Alexander the Great, is said to have been the inventor of this method of formation.[2] He placed the officers on the angles, and the most skilful soldiers in the outside ranks, leaving the centre to be filled up with weaker and less trained men.

In the reigns of Philip and Alexander the military power of Greece reached the zenith of its splendour, and the Macedonian army at that period was a model of a perfect Grecian army;[3] its organisation was not much less elaborate than exists in the best armies of Europe at the present day.[4]

They had both field and siege artillery, as well as a transport corps with its train of horses, mules, and carts, the whole being under military officers. The phalanx of infantry was a mass, 256 men in front by a depth of 16; in all 4,096. Attached to the phalanx were 2,048 light armed infantry and two regiments or hipparchies of 512 horses each.

The cavalry were of three kinds: the heavy, who wore coats of mail, helmets and brazen greaves, and carried swords and short thrusting pikes; the light cavalry, who were used mainly for outpost duty, and were armed with lances about sixteen feet long; and the dimachi (*διμάχοι*), who were formed by Alexander the Great, and were similar to the modern dragoons, being intended to fight both on foot and on horseback.

The dimachi (*διμάχοι*) were armed more heavily than the other cavalry, but not so much so as the heavy armed infantry. Alexander attached to them valets or attendants, whose duty it was to hold the horses while the horsemen dismounted to fight on foot. This seems to have been the first instance of the use of dragoons, and we see in it again the same idea that

[1] Xenophon, Hellenics, book vii., ch. v. 23, 24, 25. [2] Mottin de la Balme, 6.
[3] Graham, 34. [4] Macdougal's Hannibal, 14.

led to the use of the early war-chariots—that of carrying an armed soldier speedily and without fatigue to the scene of conflict. The art of war by this time had so improved, that the importance of rapidity of movement in anticipating an enemy in seizing an important position had come to be fully understood, and Alexander, one of the greatest military reformers, saw the advantage to be gained by a force such as described, which could operate upon broken ground where chariots could not be used.

Alexander improved the cavalry considerably, drew them up in shallower lines eight in depth, and left intervals between the troops in which he placed light armed infantry to aid and assist the horsemen. The ile, or troop in time of war he increased from 64 to 250 horses.[1] The phalanx of heavy armed infantry was the base or reserve of his army. With his cavalry and the hypaspistes (a chosen body of about 6,000 light infantry equipped and armed specially for offensive movements, and having great mobility), he usually opened the attack upon the enemy, while the phalanx followed up the success.

Alexander was the first among the Greeks to employ cavalry to a great extent in his army. The proportion of cavalry to the infantry before his time averaged from a twelfth to a fifteenth. On his expedition to Persia he set out with 5,000 cavalry and 30,000 infantry, or in the proportion of one to six. At Arbela he had 40,000 infantry and 7,000 horse. Not only did he increase the proportion, but he increased the rapidity of their movements, and their ability to manœuvre in masses. His fiery and impetuous nature led him naturally to favour the cavalry service, and we find him in nearly all his battles leading the cavalry of his right wing, opening the action with a charge, and always appearing at the decisive point at the head of a victorious body of horsemen.

He was the first apparently to have the idea of using the horse and his rider as a projectile weapon, so to speak. He understood the advantage of hurling masses upon the enemy and breaking through them by the mere momentum. While Alexander was delivering crushing blows with his horse and with the lighter infantry, the phalanx on the left centre was the mainstay or *point d'appui* of the line of battle, the left being refused and fighting mainly upon the defensive until the crisis of the action, when it charged.

The main strength of Alexander's cavalry consisted of two chosen regiments, one Macedonian and the other Thessalian.

[1] Lecomte, 53, 54.

Each corps consisted of about 1,500 men. They were armed as heavy cavalry, or cataphracts, with long lances and swords, the men and horses both being well equipped with defensive armour.

In addition to all his other cavalry, Alexander had a *corps d'élite* composed of young Macedonians distinguished by their birth, courage, and address. They were called his "friends." They fought around him and with him. He caused Lysippus to cast in brass statues of twenty-five members of this corps who were killed at the battle of Granicus, and placed them in the city of Dium.

At the battle of Granicus Alexander crossed the ford at the head of the cavalry of his right wing. Arrian says, "Never was there a more obstinate conflict of horse known." The Persians fought chiefly with barbed javelins, the Macedonians with spears; Alexander, observing where the Persian officers and their horse stood thickest, there made his first effort. The Macedonians, well disciplined, well led, and armed with lances for hand-to-hand fighting, soon defeated their opponents, who seem to have relied upon missile weapons, and to have awaited the charge on the river bank.[1] Alexander, who fought in the thickest of the *mêlée*, had part of his helmet carried away, and was slightly wounded, while his friend and companion Clitus saved his life by cutting down Spithridates, who was attacking him from behind. The light armed foot in this passage fought among the horse, and, according to Arrian, inflicted great damage upon the Persians.

In this action Alexander showed all the qualities of a great cavalry commander, for after defeating the horse of his enemy and driving them from the field, he did not follow them any distance, but immediately faced about and charged violently upon the foreign mercenaries, who were still firmly holding their ground. The Macedonian phalanx of heavy armed infantry attacked these mercenaries at the same time, and, as Arrian says, "the whole body of horse" also charged vigorously, we must assume that the cavalry of the left wing must have struck upon their right and right rear, while Alexander charged upon their left and left rear. The result was a complete victory; all the foreign mercenaries in the Persian army were killed, except 2,000 who surrendered themselves prisoners.

Nothing could be better than the conduct of Alexander in this action as a commander of cavalry. The battle in its main features is very similar to the battle of Rocroy, where, the great Condé won the victory by a like use of his cavalry.

[1] Arrian, i. ch. 16.

How different from Prince Rupert at Naseby and Marston Moor, or Jean de Wert at Nordlingen!

At the battle of Issus Alexander again fought on the right wing, and charged across the river in face of a flight of arrows, but the moment they came to hand blows the enemy turned their backs and fled.[1] The Greek mercenaries in the army of Darius in this battle also fought desperately, and inflicted heavy losses upon the Macedonians before they were defeated. As soon as the mercenaries gave way, Alexander with his cavalry pressed the pursuit vigorously, so much so, that Darius had to abandon his chariot with his cloak, bow, and shield, while he escaped on horseback under cover of the night.

At the battle of Arbela, Alexander, as usual, fought on the right wing at the head of his cavalry, where the decisive struggle took place in preventing the Persians from turning the right flank of the Macedonian army. The Persian line far overlapped their opponents, and the turning movement would have succeeded, had not Alexander, in anticipation of it, formed a reserve or second line, from which he ordered up the auxiliary horse under Menidas to attack them while in motion and drive them back. A desperate struggle ensued, and here was seen the importance of fresh reserves in a cavalry action. Menidas, overpowered, began to fall back, when Aretes, with the Pæonians, was ordered to his relief, and the barbarians gave way. But another body of Bactrians, coming to the aid of the flying Persians, rallied them and restored the fight. After a hard struggle Alexander, with the force of cavalry under his immediate command formed into a sort of wedge or column, made the decisive charge upon the Persian line and broke through a gap that had opened in it.[2] The success of this charge was followed up by the phalanx, which broke into the barbarian ranks with irresistible force. Then Darius gave up all for lost and fled. Parmenio, on the left wing, by this time had got into action, and was suffering severely under the attacks of the right wing of the Persian army. A body of the enemy's cavalry had also pierced through a gap in the Macedonian line between Parmenio and Alexander, and had penetrated as far as the camp where the baggage and captives were under the guard of the Thracian infantry. The fate of the battle was trembling in the balance when Alexander, calling back his cavalry from the pursuit on the right, fell with great fury upon the light horse of the enemy's right wing. After a hard fight he defeated them, and then pushed on to Parmenio's assist-

[1] Arrian, ii. ch. 10. [2] Ibid. iii. ch. 13, 14, 15.

ance. His Thessalian horse of his left wing had already attacked with such valour that, on Alexander's appearance, the whole Persian right broke and fled. Alexander at once turned again with his horsemen, and retracing his steps took up the pursuit of Darius and kept it up till dark, Parmenio following up the victory in his part of the field.

The Persians in this action used a large number of armed chariots which were placed in front of the line of battle. The Greeks by this time, however, had learned how to meet them to the best advantage. The Agrians, who were light armed troops, and the darters under Balacrus were placed in front of the Greek line, and with their missile weapons destroyed many of the chariot horses and their drivers. They also seized the horses by the reins and stopped them, and threw the drivers from their seats and slew them. Some made their way through the middle of the army, for they opened their ranks as Alexander had ordered wherever the chariots approached, and afterwards closed up again and remained firm and unharmed.[1] The cavalry in the reserve afterwards captured most of those who got through.

Alexander passed the river Lycus, and halted there to refresh his men and horses till midnight, when he started on again in pursuit, arriving at Arbela the next day, a distance of 600 furlongs (about seventy miles English) from the battle-field.

There is no battle in history in which a better appreciation is shown of the cavalry service, nor a better use made of it, as well in action as in the pursuit.

After this battle Alexander altered the organisation of his cavalry by appointing two decurios to every troop. Before this time there had been no decurios in the mounted service.[2] He made these appointments partly, it seems, to have his cavalry better officered, but probably also to give him an opportunity to promote some of his auxiliaries, who had served him with great courage and fidelity.

He also after this constituted a troop of "darters" to fight on horseback, and he continually employed flying columns consisting mainly of cavalry of all kinds, with which he made raids or inroads upon the tribes in the neighbourhood of his line of march.[3]

It was with a flying column mainly composed of cavalry with some picked infantry that he pursued Darius after the battle of Arbela, when he heard that the Persian king had fallen into the hands of his Bactrian satrap Bessus. After marching almost incessantly for three days and nights, his

[1] Arrian, iii. ch. 13. [2] Ibid. 16. [3] Ibid. 24.

infantry from weariness could not keep up, whereupon he dismounted 500 of his horsemen, and placed his captains of foot and others of the best infantry (men who were heavily armed) upon the horses, and pushed on in pursuit all night, ordering the remainder of the infantry, as well as the dismounted cavalry, to follow slowly on foot. He came up with the barbarians early in the morning, and put them to flight instantly. Bessus escaped with 600 horse after having assassinated Darius, who died of his wounds shortly before Alexander saw him.

The energy and impetuosity of this pursuit will compare favourably with anything of the kind recorded in history, and the fact of Alexander dismounting a portion of his cavalry to mount infantry men upon the horses deserves close attention, showing as it does the appreciation that great master of the art of war had of the value of a force of dragoons which, with the rapidity of movement of cavalry, would yet when brought into action have the solidity and defensive power that well-organised foot-soldiers alone can have. Further on in this work the gradual development of this idea will be shown, and the various attempts made from age to age to utilise the principle will be recorded, in order that the question may be intelligently discussed, as to whether the improvements of modern military science have made the dragoon force more or less useful than in previous times.

It may here be mentioned that in the wars of Alexander, as well as long previously, light cavalry were used for outpost duties—that scouts were used for reconnoitring, and patrols and sentries and videttes seem to have been employed very much upon the same general principles as are in use at the present day.

SECTION III.—THE TRAINING OF THE GREEK CAVALRY.

The Greeks paid great attention to the training of their soldiers. From their infancy almost they were accustomed to gymnastic exercises tending to increase their strength and activity. Wrestling and pugilistic encounters were, however, left to professional athletes, and were simply used as exhibitions of bodily strength and skill. Proficiency in them was not considered of any advantage to the soldier.[1] The Grecian youth were exercised in running, leaping, throwing the javelin, climbing, &c. They also practised all the evolutions in which they might possibly be engaged in action, using pikes without iron points. The cavalry soldiers were

[1] Duparcq, 53.

carefully trained to mount and dismount from their horses, and were exercised in vaulting upon wooden horses in order to become proficient in an accomplishment that was very necessary in an age when they had not the aid of the stirrups by which modern horsemen mount so easily.

Xenophon has described the steps taken by Agesilaus to form a body of cavalry when in Phrygia, and that skilful general seems to have taken the greatest pains in getting recruits to obtain approved riders, drawing his levies from horse-breeding districts, in the idea that the recruits from those sections would be expert horsemen. When he had collected his forces at Ephesus, he drilled them continually, and to incite them to take pains he offered prizes to the troops of horse to such as should ride best. The places of exercise were consequently crowded with men practising, the horse course full of horsemen riding about, and javelin men and archers aiming at marks. This cavalry, so carefully drilled, aided materially in gaining the successes which followed in the campaign.

In his "Treatise on Horsemanship," Xenophon gives an elaborate description of the method of mounting in use in his age, and it seems that even then the horse was mounted from the left side. He says the rider "must take the rein, which is fastened to the lower part of the bit, or to the chain that goes under the chin, in his left hand in a convenient manner, and so loosely that he may not, either as he raises himself by grasping the mane near the ears, or *jumps on the horse's back with the assistance of the spear*, pull the animal back." This seems to intimate that there were two methods of vaulting upon the horse; one somewhat similar to the way in which a groom will now get on a horse bare-back by vaulting with the hands resting on the withers; the other by means of the assistance of the spear. There is, according to Berenger, a collection of antique plates in the British Museum in which there is one representing a soldier going to mount his horse by the aid of his spear. The spear is planted at the side of the horse, and has a hook upon the shaft, on which the man placing his foot easily bestrides the horse.[1] This explains the above passage. The same writer adds that Livy mentions likewise this method of getting on horseback as practised by the Roman soldiers.

In mounting from the right side Xenophon says it is very proper to practise it as well as the other, as there is nothing more to learn than to perform those movements with the left

[1] Xenophon, 284 note.

hand and foot which the rider had previously performed with the right.

The horseman was taught to sit well upright upon his thighs, and not as if seated on a chair: and was taught to cling to his seat with his thighs, letting his legs from the knees down hang loosely. The body of the rider was carried erect, so that he could have full command over his weapons. The reins were carried in the left hand as at present, the arm being kept close to the side.

The horsemen were drilled in sham combats with each other, using spears and javelins blunted with balls, and by alternately retreating and charging, they gained the necessary skill in the use of their horses and weapons which was required in actual warfare.

SECTION IV.—XENOPHON'S TREATISE ON CAVALRY.

This is the most ancient work we have which treats specially of the cavalry service, and is very interesting as an expression of the views of a skilled soldier who throughout all his writings seems to have shown not only a thorough knowledge of the cavalry service, but an appreciation of and fondness for it of a very marked character.

The treatise is addressed to some particular person, supposed to be his son Gryllus, who served in the Athenian cavalry, and it details fully all the duties of a commander of horse in the Athenian service, how the force may be maintained at the proper number, how to equip them properly, and how to exercise them in peace and in war.

The work shows that, in very many essential points, the Greeks of his age had attained a considerable skill in the management of their cavalry. The weapons and system of fighting, both among the infantry and horsemen of that time, were so different from the arms and system at present in use, that the mere details of drill are of but little interest to us now, but upon the general principles which govern the use and employment of cavalry Xenophon's views merit close attention.

In his first chapter he impresses upon the reader the absolute necessity of great care in the choice of horses for the cavalry service—kicking and unmanageable horses are to be avoided, and well-trained ones alone kept in the force. Attention is also to be paid to their feet, that they may be in a condition to be ridden on rough ground, and he advises having the horses stand upon smooth round stones while

being groomed, so as to harden the hoof, the use of iron shoes being unknown in his day.

The next point he urges is to exercise the men thoroughly, so that they may be well able to vault on their horses readily, and to ride them easily upon all kinds of ground. As soon as the riding-school course was completed, and the recruit could sit firm, then he was to be taught and drilled as much as possible to throw the javelin on horseback. Having armed both men and horses with defensive armour, the next duty of the commander was to inculcate obedience, "for without obedience there will be no profit either in good horses or in firm-seated riders, or in fine arms."

Xenophon also advises the cavalry in drilling to ride out into the country, to leave the beaten road, to gallop their horses over ground of all sorts, and to have mock combats in such places. General Seidlitz, Frederick the Great's best cavalry general, used to exercise his regiment in this way over rough ground so violently that Frederick once found fault with him on account of the number of deaths caused by it. Seidlitz coolly answered, "If you make such a fuss about a few broken necks, your Majesty will never have the bold horsemen you require for the field."

The phylarchs, or commanders of squadrons, are urged to attend to the details of equipping, and superintending the exercises of the contingents under their immediate orders, and are told to endeavour to excel all their men in horsemanship and all the other duties of a cavalry soldier, setting thereby a good example, and securing also more respect and a more ready obedience.

The lance, he says, should be carried pointing forwards over the horse's head between his ears. The movements he details, however, are generally parade movements to be performed before the Senate in order that the force might be approved, as it was the law in Athens for no man to serve in the cavalry without having first been inspected and approved.

In marching on active service he suggests that in order to give rest to the backs of the horses, as well as to afford relief to the riders, the commander should move them at a moderate pace, and at times dismount the men and let the force march leading their horses. This is an idea that should always be borne in mind in making forced marches, for it is a great relief to both man and horse, and gives a considerable amount of rest with very little loss of time.

The method given for increasing or diminishing the front of the column is much the same as that in use in modern times. He says in marching through narrow passes you

must lead your men in single file. In broad roads extend the front of each tribe, and in the open plain you must form all the tribes in a solid body.

He advises extraordinary scouts in advance of the ordinary ones in an enemy's country to give timely notice of the proximity of the foe. His idea is evidently that in addition to the usual advanced guard there should be small reconnoitring parties still further in advance; a precaution of value in all ages.

He advises a commander of cavalry to acquire in time of peace an accurate knowledge of the enemy's country as well as his own, for he says truly that "a leader who knows the roads is a totally different person from one who is totally ignorant of them; and in forming plans against the enemy, he who has a knowledge of the country has a vast advantage over him who is a stranger to it." When General Von Moltke, in the summer of 1868, travelled incognito over the eastern districts of France, in anticipation of the war which broke out two years later, he was following to the letter the advice given by Xenophon to his son over 2,200 years previously. The result proved that the advice had not lost its value by the lapse of so many centuries.

The instructions as to the posting of pickets and sentries are admirable. He advises secrecy, so that they may be a security to their friends and an ambush for the enemy. Outposts concealed are less liable to surprise, and more to be dreaded by the enemy, and an attacking force not knowing where to meet resistance, watches every spot with suspicion, and cannot move so freely or so rapidly.

The whole treatise shows a great experience in the cavalry service, a complete knowledge of the duties of a commander, and is marked throughout by a keen appreciation of human nature and of those moral influences which so much affect a body of soldiery.

CHAPTER III.

ROMAN CAVALRY.

SECTION I.—EARLY HISTORY.

THE infantry was the most important portion of the Roman armies. It was with their infantry that the Romans conquered the world, and to it that the greatest care was devoted in order that it might be always maintained in the highest state of efficiency. They were well equipped both with defensive armour and offensive weapons, and were drilled and exercised continually, so that their discipline was always as perfect as attention could make it. The Roman infantry at the earliest period was drawn up in the phalanx formation, in which they probably copied the Greeks,[1] but they very soon adopted the system of maniples by which the legion was divided into a number of small fractions, which gave it much greater mobility. Under Cæsar several maniples were united, and the cohort became the tactical unit. Under the Empire this was also the customary formation, the cohorts consisting of about 555 men each.[2]

The Romans, like the Spartans, were not naturally a cavalry nation, although their highest order in the state served in that force. It is, however, a fact worthy of mention that no officer of the legion during the time of the Republic was permitted to serve mounted. In times of great emergency when a Dictator was appointed, he also, although invested with supreme power, was not allowed to ride on horseback unless he first obtained permission from the people.[3]

If the early legends which form the basis of the first period of Roman history are entitled to any credence, it is clear that the mounted service was both understood and made use of to a certain extent from the very foundation of the state—although the persons whose names are mentioned in connection with it were probably mythical.

[1] Bardin, 3075. [2] Gibbon, i. 14. [3] Roman Antiquities, 117.

Up to the time of the second Punic War, however, the Roman cavalry were weak in numbers, and, although brave and gallant soldiers, were not very efficient as horsemen. In their early wars we see that the issue of nearly all the battles depended almost entirely upon the exertions of the legionary infantry, and there are not many instances of successes gained through the efforts of the cavalry; the most noted being the capture of the town of Trossulum in Tuscany by the Roman knights alone without assistance.[1] On account of this feat the equites were sometimes called Trossuli.[2]

When Romulus, according to the legend, organised the new community, and divided it for civil and military purposes into tribes and curiæ, each tribe maintained ten curiæ of 100 men each; so that the three tribes together furnished a force of 3,000 infantry, which was the main military strength of the state.[3] In addition to this Romulus also instituted a body of horsemen called *celeres* or *equites*, who were formed into three centuries of 100 men each, taken equally from the three tribes. They are said to have been armed with the sword and javelin,[4] and were accustomed to fight either on foot or on horseback. They were of patrician rank, and were chosen young men who served about the person of the king in peace and war, as a species of body-guard.[5]

Tarquinius Priscus seems to have valued the cavalry service more highly than his predecessors, and made more use of it, for he doubled its numbers by adding 100 men to the century of celeres of each tribe, who were known by the name of *Ramnes*, *Titienses*, and *Luceres posteriores*.[6] The early records say that he made much use of these horsemen in his wars and derived great advantage from them.[7]

Servius Tullius reorganised the army and the state. The three double centuries became six; they were the six patrician centuries of equites often referred to under the name of the *sex suffragii*.[8] To them were added twelve new centuries of knights formed from the richest members of the community, property, and not birth, being the qualification.[9] These no doubt contained many plebeians, but must also have contained some patricians, for it is not probable that the whole body of the patricians were in the six old centuries. No one was admitted into the centuries of equites in the early times of the Republic unless his character was unblemished, his

[1] Bardin, 1118.
[2] Lemprière, Trossulum.
[3] Roman Antiquities, 137.
[4] Bardin, 1118.
[5] Lemprière, Celeres; Livy, i. 15.
[6] Roman Antiquities, 137.
[7] Arnold, History of Rome, 16.
[8] Roman Antiquities, 137.
[9] Livy, i. 43.

property qualification sufficient, and his father and his grandfather had both been born freemen.

The eighteen centuries of knights, established under the constitution of Servius Tullius, were all furnished with horses at the expense of the state, and with an annual payment for their support. Afterwards, about the year 403 B.C., another class of equites came into use in addition to the old force, and consisted of those citizens who had a sufficient fortune to serve in the equestrian ranks, but had no horses allotted to them by the state.[1] This class furnished their own horses, and served in the cavalry in preference to the infantry, but do not seem to have been considered as holding the full rank of equites.

The censors made a public inspection during their censorship of the equites who were intrusted with horses by the state. They marched past the censors on foot in single file, each knight leading his horse.[2] If the censors were dissatisfied with the character of the knight or the condition of his horse or his equipment, and considered him unworthy of his rank, they struck his name from the roll, deprived him of his horse, and in some instances compelled him to serve on foot. This punishment was looked upon as a great disgrace.

In the year 251 B.C. 400 Roman knights refused to obey the command of the Consul Aurelius Cotta to work upon some fortifications in Sicily.[3] He reported them to the censors, who degraded them all from their rank and deprived them of the right of voting.[4]

The cavalry were enlisted for ten years, the infantry for sixteen, or twenty if required.[5] If the knight who had served ten years still wished to retain the horse furnished by the state and continue his service in the cavalry, he could do so provided he was capable of performing the duty efficiently.[6]

The social class from which the cavalry were drawn in Rome was the highest both in rank and wealth in the community. This seems to have been a custom common to all nations in the early ages except some of the Greek states. The ruling order or class, as we have seen in the references to the Assyrians and Egyptians, fought in chariots, and afterwards on horseback, and it was evidently looked upon as a social distinction to serve in the mounted force. The Roman knights had many exclusive privileges, and soon became a distinct order in the state. The active part the knights took in suppressing the conspiracy of Catiline increased the power and influence of the equestrian

[1] Roman Antiquities, 138. [2] Ibid. 73, 138. [3] Frontin, iv. 1, s. 22.
[4] Arnold, 437. [5] Roman Antiquities, 145. [6] Bardin, 3584.

order to such an extent, that Pliny says that from that time it became a third body in the state, and to the title of *Senatus Populusque Romanus* there began to be added *Et Equestris Ordo.* They were distinguished by wearing a gold ring peculiar to their order and its distinctive badge.

In the neighbouring states the cavalry were also composed of the aristocratic classes, for we read that in the victory gained by L. Papirius over the Samnites in the year 293 B.C., the mass of the routed army fled either to their camp or to the town of Aquilonia, but the cavalry, containing *all the chiefs and nobility* of the nation, escaped to Bovianum.[1]

In Rome the class of equites existed long after it was used as a distinct corps of cavalry serving in the army. In the later periods of the Republic the cavalry were supplied almost entirely by the allied states. In the Gallic War Cæsar had no body of Roman cavalry, for he was escorted to his interview with Ariovistus by a number of his legionary soldiers whom he mounted upon the horses of his Gallic cavalry, as he was afraid to trust his safety to the horsemen furnished by his allies.[2]

The equites, although not serving as a distinct corps in the later wars, are frequently mentioned, for they appear to have been employed almost altogether in positions of trust,[3] either as officers in the cavalry of the allies, or in command of the legions, or as staff-officers assisting the general-in-chief, or as singularii or volunteers, who were employed as they might be most useful.[4]

In the time of Augustus the knights occupied a most important position, all the higher officers of the army were chosen from among them, as well as the chief magistrates, so that it was esteemed a great privilege to be admitted into the order.[5] It was also the best introduction into public life, as without it a young man was excluded from all military rank above that of centurion, as well as from all civil offices of any importance.

All those equites who were on active service were obliged to live in Rome, and during the Empire they still retained a considerable degree of social importance. As late as Valentinianus and Valens they occupied the second rank in the city and were not subject to corporal punishment.[6]

The officers of the cavalry ranked higher than those holding a similar position in the infantry. The cavalry *decurion* was of equal rank with the *centurion* of the legion.[7]

[1] Arnold, 345. [2] Cæsar, i. ch. 42. [3] Roman Antiquities, Equites.
[4] Bardin, 4887. [5] Roman Antiquities, Equites. [6] Roman Antiquities.
[7] Barden, 4250.

We have very little information as to the system of drill and method of fighting in use among the Romans in the very early ages. In the account Livy gives of the battle between the Romans under Valerius and Brutus, and the people of Veii under the banished Tarquin and his sons, he says that Valerius led up the foot in a square battalion (evidently in the phalanx formation), and Brutus marched before with his horse to reconnoitre. The Veientians came up in the same order, Aruns, Tarquin's son, in command of their horse. The cavalry must have charged each other with lances, for it is stated that Brutus and Aruns transfixed each other with their lances and both fell lifeless from their horses.[1]

At the battle of Lake Regillus the cavalry appear to have fought with spears or lances. After the battle had been raging for some time with varying fortune, and the Romans were almost despairing of success, the Dictator Posthumius went to the cavalry in the reserve and entreated them to dismount from their horses and join the fight, as the infantry were exhausted with the severe struggle that had been going on.[2] They dismounted, hurried to the front, and formed in the first line, and fought with the tired foot-soldiers, who, inspirited by this action of the young noblemen, increased their exertions, and soon the Latins were beaten back and routed. The horses were then brought up to the cavalry, who mounted and pursued, followed by their infantry, and soon captured the enemy's camp.

Livy mentions that in the year 481 B.C. the Consul Kæso Fabius routed the army of the Æqui solely by a charge of his cavalry, but that the infantry refused to pursue them when routed on account of their hatred of the consul.[3]

In the battle between the Romans and the Sabines, in the year 447 B.C., when the Sabines suddenly turned the flank of the Roman line, about 600 cavalry of two legions leaped from their horses and rushed forward and restored the battle, then remounted their horses and galloped across to the other wing announcing their success, and by a charge contributing also to victory in that portion of the field.[4]

Another remarkable instance of the good services of the Roman knights occurred in a battle fought in the year 422 B.C., between the Romans under the Consul Caius Sempronius, and the Volscians. The Roman infantry in the battle do not appear to have been in a good state of efficiency, the historian complaining that there was more Roman discipline in the Volscian than in the Roman army. The Volscians attacked boldly, the Romans hesitated, wavered,

[1] Livy, ii. 6. [2] Ibid. 20. [3] Ibid. 43. [4] Ibid. iii. 62.

and although there was no absolute flight, they were giving way at all points, when Sextus Tempanius, a commander of a troop of horse, called to his men to leap from their horses, to follow his spear as their standard, and to show that no cavalry were equal to them as cavalry, no infantry as infantry. Their onset was made with such spirit that the fight was restored, the Volscians were obliged to make way for them, and they broke through the lines which closed behind them, cutting them off from their own army. The Volscians showed front both ways, opposing Tempanius in the rear, and still continuing the battle against the Romans, who made desperate efforts to rescue their horsemen. Tempanius, unable to cut his way back, succeeded in reaching an eminence, where these young Roman knights formed a circle as the Scottish knights and nobles did at Flodden, and fought till night separated them, when both armies took a panic and fled in opposite directions, leaving Tempanius in undisputed possession of the field.[1] He did not move till daylight, fearing an ambush, but then, finding the neighbourhood deserted, he led his little band back to Rome, where a warm welcome was accorded to them.

These actions, the details of which are fully recorded in Livy, show that it was sometimes the custom of the Roman knights to fight dismounted, but it could not have been the intention to use them generally in that way, or it is probable they would have been more heavily armed with defensive armour.

At the battle of Sentinum, the Roman and Campanian cavalry charged the Gaulish horsemen twice and with effect, when they were encountered by the war-chariots of the enemy, a force wholly strange to them, which frightened their horses, threw them into confusion, and drove them in rout back upon their infantry.[2] The war-chariots in this action seem to have done effective service, but evidently more on account of their novelty and the moral effect they produced, than on account of any real value in them.

SECTION II.—EQUIPMENT, ARMAMENT, AND TACTICS OF THE EARLY ROMAN CAVALRY.

The equipments of the first Roman horsemen were of a very simple character. They seem to have worn a species of tunic which left the limbs naked, in order that they could mount and dismount with the greatest facility.[3] They did not use either saddles or stirrups, but had a pad or covering

[1] Livy, iv. 38, 39. [2] Arnold, 340. [3] Duparcq, 117.

upon which they sat, and which was kept in its place by a girth, a breast leather, and a crupper.[1] They wore no cuirass, their sole defence being a round shield covered with ox-hide, and a helmet. Their lances, according to Polybius, were useless for two reasons: in the first place they were very light and weak, so that the least thing would break them; in the second place, they were only pointed with iron at one end, so that when they were broken in the first charge, which was usually the case, the piece remaining in the knight's hand, not being sharpened with iron, was of no further use. Polybius speaks very contemptuously of the bucklers used by the Romans in early times, saying that they were no defence as they were not strong enough to resist anything, and even if properly made, the leather softened and spoiled with the rain to such an extent as soon to render them worthless. The early Roman cavalry carried swords as well as lances and javelins.[2] As they were very lightly armed, in fact almost destitute of protection, they incurred great risks in action.

They afterwards improved their cavalry by borrowing the system of the Greeks. They adopted a lance longer and stronger and ironed at both ends, the handle being almost one-third from the rear end. The bucklers were also improved, were made smaller and stronger, and of a square or oblong form. The swords were broad in the blade, only thirteen inches long, and very sharp in the point. They were worn on the right thigh until the time of Vespasian, when they were put on the left, and a dagger worn on the right.[3] Helmets were also worn at first of leather, afterwards of metal. At the time that the cavalry were without defensive armour, the infantry were all supplied with cuirasses. Although we see that in the battle already referred to, which took place between Brutus and the Tarquins, the cavalry commenced the action, it must not be supposed on that account that the cavalry were in the habit of opening the battle, for we see many instances where the cavalry were in the rear as a reserve, and in the crisis of the engagement were brought up on foot to the aid of the infantry. One instance occurred at Lake Regillus, another in the action between the Romans and the Sabines in 447 B.C., and again in the case of Sextus Tempanius, all of which actions are referred to in this chapter.

The reason for the cavalry opening the action between Brutus and Tarquin is easily gathered from the account in Livy, which says that Brutus marched before with his horse *to reconnoitre.* Aruns Tarquin with the enemy's horse came up

[1] Polybius, book vi. ch. 4; Humbert, 27. [2] Bardin, 1118. [3] Roemer, 279.

in the same way, and when he recognised Brutus, accompanied by the lictors of a consul, all inflamed with rage, he cried out, "There is the villain who has banished us from our native country! See how he rides adorned with the ensigns of our dignity. Now assist me, gods, the avengers of kings!" and he put spurs to his horse and drove furiously against Brutus.[1] They transfixed each other, and both fell dead, and the action between the horse commenced at once. This shows that a violent personal animosity brought on this fight between the reconnoitring parties, and is no proof of a custom, against the existence of which there is some evidence.

It seems probable that the cavalry were organised, equipped, and maintained for two objects: to reconnoitre, in which service they did not require heavy armour, as they could perform that duty without coming to close quarters; and as speed in movement was a great object, it could be attained much better by keeping the men as lightly armed as possible. In the second place, it seems that during the action the horsemen were held in the rear, not so much as a reserve, but more probably to be used in case of a victory to pursue a flying foe. It will be seen that for this purpose also heavy defensive armour would not be required, as in the panic of a retreat they would not expect any serious resistance from the fugitives, while being lightly armed they could pursue with much greater rapidity.

Had the intention been to hold the cavalry in reserve, and to dismount them to fight on foot in the line of action in case of disaster to the infantry, it is clear that they would have been armed more heavily even than the foot soldiers, for they would have been considered the mainstay of the battle, and being carried on horseback could without fatigue have worn much heavier armour than if they were not mounted. Their old method of using horsemen seems to have been maintained until the wars with Hannibal, when many changes were made in the equipment and management of the Roman cavalry.

As late as the battle of Cannæ the Roman knights leaped off their horses to fight the Carthaginians.[2] Hannibal, seeing it, said, "This pleases me better than if they were delivered to me with their feet and hands tied."[3]

The turma was the tactical unit of the Roman equites, and consisted of three decuriæ of ten men each, commanded by three decurions. The senior decurion had command of the turma. Besides these officers were three others chosen by

[1] Livy, ii. 6. [2] Plutarch, Fabius, 135. [3] Folard. Polybius, iv. 392.

them, who acted as serrefiles,[1] so that a turma consisted altogether of thirty men and six officers, all under the command of the senior, or in his absence of the second decurion. It was formed for action in three ranks, with ten men in front, and sometimes four in depth by eight in front. The commander of the turma led in front of the centre, the second and third decurions were on the right and left flanks respectively, in line with the front rank. The three serrefiles were in rear, one in the centre, the others on either flank. There was a flag or ensign to each turma.

There were ten turmæ to each legion, or one to each cohort, so that the legionary cavalry formed about one-eleventh of the legion.[1] They were usually drawn up on the two wings, although they were sometimes placed in front, and sometimes in the rear of the infantry.[2] The legion of the allies consisted of the same number of infantry as the Roman, but the cavalry were twice as numerous, there being 640 to the legion of allies, and 320 to the Roman. The turma formed up with intervals equal to their own front, and each file occupied about five feet of space, in order to give the soldier room to use his missile weapons. These small tactical units gave great facility for manœuvring, and tended to prevent confusion, which in large bodies of poorly trained troops would easily arise.

When sixteen turmæ of auxiliary troops were united they formed a wing or *ala*, and this was commanded by a prefect. The cavalry upon the wings were generally aided by light infantry, who were mingled with them and skirmished during the battle; the remainder of the cavalry placed in rear of the infantry followed up the victory. The allied cavalry, as we have seen, were much more numerous than the Roman. They seemed to have performed the duties of light cavalry and to have been used principally for reconnoitring and foraging. They were often raised in the country where the war was carried on, and formed of those who were partisans of Rome. When drawn up for action they were placed on the wings, and were called *equites alarii* to distinguish them from the Roman cavalry called *equites legionarii*.

Before the Punic War the Romans, although they considered the cavalry as the most honourable service, and filled its ranks with the young men of the highest position in the state, had never appreciated the true genius of the arm, and had never understood the proper method of drilling it or employing it in war. There does not appear to have been any design in their management of the force except that

[1] Liskenne, ii. 30. [2] Ibid.

which has been already intimated, of using it to reconnoitre and to pursue. The speed of the horse was utilised by them for these purposes simply, but the idea of using a mass of cavalry as a projectile weapon, to be hurled at speed upon an enemy, to crush down all opposition by its weight and velocity, was not thoroughly appreciated by them.

They used them often on foot, and it is strange that they never organised a force of heavy armed dragoons that could have dismounted and taken their place in line with the *triarii* or best of the foot soldiers. They did not organise such a corps, but continued to maintain a force badly equipped and armed, and quite unfitted for the great sphere that was open to cavalry in an age when projectile weapons had a range of but a few yards.

SECTION III.—CAVALRY IN THE WARS WITH HANNIBAL.

Hannibal, who was one of those great masters of the art of war who appear only at intervals separated by centuries, and who have always left a deep impress of their genius upon the records of the military science, was the first in Western Europe to estimate the cavalry service at its true value, and to clearly understand the full benefits to be derived from the proper use of it. Like Alexander in the east, Hannibal in the west obtained a series of the most brilliant successes against the finest infantry of his age, by the skilful use of a numerous and well-trained cavalry.

Hannibal left the Pyrenees to invade Italy with 50,000 infantry, and 9,000 cavalry, all picked soldiers who had fought in the wars in Spain until they were tried veterans. The proportion of cavalry to the infantry was much greater than in the Roman armies, and almost the same as in the army Alexander the Great led into Asia Minor. The cavalry of the Carthaginians was, however, infinitely better in quality than that of the Romans. They were divided into heavy and light. The heavy cavalry wore coats of mail, helmets and brazen greaves, and carried a sword and a short thrusting pike as offensive weapons.[1] They were formed up according to the Greek custom in troops of sixty-four men each, eight in front by eight in depth. The cavalry of his Gaulish allies were heavy cavalry using large broadswords, and being equipped and formed up and manœuvred in the same way as the Greek Cataphracti.

The Numidian cavalry, which formed the light horse of Hannibal's army, were reputed to be the finest light cavalry of

[1] Macdougall's Hannibal, 11.

the age. There are such conflicting accounts as to their armament and equipment, that it is difficult to describe their method of fighting with much certainty.

Their horses were small thin animals, and were ridden without saddles, as in all the other ancient cavalry.[1] The men were poorly equipped, in fact almost naked, and managed their horses with a whip or thong of leather. The services performed by these horsemen under Hannibal were so great that it is hard to conceive that they were so poorly supplied. They used no reins nor bridles, for Polybius, in describing the battle of the Ticinus,[2] speaks of the heavy cavalry *with reins*, being placed in the centre, and the Numidians upon the wings; the inference of course being that the Numidians used no reins. The Numidians are also referred to by ancient writers as "*gens inscia freni*" and "*Numidæ infreni.*"[3]

On the column of Trajan the Numidian horsemen are represented as almost entirely naked, their only garment being a small cloak or mantle worn across the shoulders and flying loosely in the air.[4] Montfaucon describes one figure so dressed. A Roman soldier is trying to drag him from his horse by the hair of the head. The horse, a small slight animal, has neither saddle nor bridle, nor pad nor straps. Strabo says that the Numidians directed their horses where they wished with a small rod, and that, without being led, their horses would follow them like dogs.[5] In view of this accumulated testimony, it is probable that the Numidians must have been able to manage their chargers without bridles. Folard, however, does not place any reliance upon the figures on the Trajan column, treating them as "*une pure reverie de sculpture.*"[6] It seems probable that Folard is right except in reference to the want of bridles, but the corroborative evidence of Polybius, Strabo, Silius Italicus, Herodianus, and Virgil, confirms the statement that the Numidians used no reins.

The Numidians may have been accustomed in their own country to serve almost naked, but it is not at all likely that, when they were enrolled in Hannibal's army and were serving in Spain and Italy, they were not supplied with some light clothing. They were armed with javelins and a buckler. They were not fitted for fighting in line or by squadrons, although Hannibal seems to have trained them to such an extent, that he was able to form them in squadrons of sixty-four each, and draw them up on the wings of his army in the front line.

[1] Beamish, 29, 30.
[2] Polybius, iii. ch. 13.
[3] Silius Italicus, quoted in Beamish, 31.
[4] Lemprière, Numidia. Virgil.
[5] Beamish, 30.
[6] Folard, iv. 116.

Their principal use was, however, to harass the enemy, to reconnoitre, to forage, to attack convoys, to annoy a rear-guard, and to make raids on the baggage of their foe. They were bold and enterprising, exceedingly hardy and very rapid in their movements.[1] Their great strength lay in their capacity to harass and annoy; their tactics, like those of the Parthians, consisted in charging up in irregular groups, and throwing their javelins with wonderful skill, falling back when attacked and pressing on again when occasion offered, repeating this manœuvre with a rapidity which proved the speed, the strength, and the surefootedness of their horses.

In ambuscades, surprises and skirmishes they excelled, and they were the most useful in broken ground and in the midst of obstacles. It is no wonder that Livy said that they were the best cavalry in all Africa.

No one can calculate the enormous advantage such a force must have been to Hannibal. Without it and his heavy cavalry he could not have held his own in Italy for one single campaign; with them he fought victoriously in a hostile country far removed from his base, in fact practically cut off from it, for sixteen long years. Had the Romans been as well supplied with horsemen or been superior to him in that force, he would almost at once have been obliged from want of food to surrender, or to have evacuated Italy. It is the first instance in the history of Western Europe of the enormous advantages to be gained by an overwhelming force of cavalry. As we proceed in this work this same idea will continually recur, until example heaped upon example will show as plainly as can be possible the great value of a cavalry, numerous and properly equipped and handled.

Hannibal not only fully understood the value of cavalry in all the minor operations of war, but he was the first in the West to use cavalry on the field of battle in accordance with the true spirit and genius of the force. Under him, the horsemen in large masses were hurled with impetuous fury upon the foe, the victory being gained by the overwhelming rush of the charging squadrons. No man knew better how to pave the way to victory, by the use of his cavalry before the action, or to secure success by skilful charges of his horsemen upon the field.

The first engagement that occurred between Hannibal and the Romans in Italy took place on the banks of the Ticinus. It was almost entirely a cavalry action, and it established at once the superiority of the Carthaginian cavalry, and evinced

[1] Folard, iv. 116.

the extraordinary skill displayed by Hannibal in his method of handling it.

Publius Scipio, who commanded the Roman army, was advancing with his cavalry and some light armed troops to reconnoitre the enemy, whom he had heard were approaching, when he met Hannibal at the head of his cavalry alone, who was engaged in the same duty.[1] This brought on the action of the Ticinus, which was the first conflict between Hannibal and the Romans in Italy, and is important not so much on account of the numbers engaged as for the moral effect it produced, which was felt long afterwards.

Publius drew up his force in a single line, most probably in turmæ, with intervals between them. The Gaulish allies were in the centre, the Roman cavalry on the flanks.[2] In the spaces between the turmæ, and in the centre, the light armed infantry were placed to give strength to the line.

Hannibal drew up his heavy cavalry in single line, most probably in troops or squadrons, of sixty-four men each, with intervals between them, and his force being more numerous he was able to place his Numidian cavalry upon the wings, so that they overlapped the lines of his opponent.

It can be seen at once that Scipio, having light armed infantry intermixed with his cavalry, could not have intended to make a very vigorous charge, but evidently designed to act upon the defensive as much as possible, and the light armed troops were not sufficiently armed or stable in their formation to oppose any real resistance to the cavalry, as strong bodies of heavy armed infantry might.

Hannibal saw the weakness of this formation at a glance. His chiefs and horsemen, impatient to open the action, asked to be led on, and the order was given to charge. There was no time for the light armed infantry to harass them much.[3] Polybius says, "They had scarcely thrown their first darts, when, frightened by the Carthaginian cavalry who came upon them, afraid of being trampled under the feet of the horses, they fled back and escaped by the intervals between the squadrons." The Roman horse also moved on to meet them, and a close hand-to-hand struggle took place, many dismounting and fighting on foot after the *mêlée* had commenced. The Numidians swept around the flanks and fell upon the light armed troops who had retired to the rear and crushed them under the feet of their horses. Having destroyed these auxiliaries, the Numidians then wheeled round and fell upon the rear of the Roman centre, which was still engaged with

[1] Folard's Polybius, iv. 116. [2] Ibid. 117. [3] Ibid. 116, 117, 118.

the Carthaginian heavy cavalry, and soon put them to flight, and a complete victory was thus gained by Hannibal.

The above account, which is taken from Polybius, clearly shows that the attack of the Carthaginian heavy horsemen was very spirited, and seems to have taken the Roman light armed troops by surprise. This action established the superiority of Hannibal in the open country, and the moral effect was lasting. Scipio retreated immediately, and passed the plains with all haste to a bridge over the Po, where he crossed his army, "not believing himself in safety," says Polybius, "in a flat country, in the neighbourhood of an enemy which was much superior to him in cavalry."

The conduct of the Roman general in the opening of this campaign was very faulty. He must have known, or should have known, that Hannibal was very superior to him in cavalry, both in regard to numbers and to quality. He should also have known that his own infantry was superior to that of the Carthaginians, that it was better disciplined and more full of confidence. The Romans had always hitherto placed their main reliance upon their infantry, and had always looked to it to secure victory to their standard. It is difficult therefore to conceive for what reason Publius Scipio fought the first battle of the war with the weakest portion of his own army, against the strongest and best portion of his enemy's. The moral effect of the first victory in a war is incalculable. It is rarely that an army beaten in its first conflict can recover that confidence and that moral force which contribute so much to success.

The next great battle fought by Hannibal was that of the Trebbia, and there again the most able generalship was shown by the Carthaginian leader, while the Romans committed faults without number. Hannibal had taken up a position with his army about five miles south-east of Placentia, cutting off the communication of the Roman consuls with Rome and Ariminum. The Romans then marched out of Placentia to the west, and crossed the Trebbia and camped on its left bank, probably to be near the towns in which their magazines and supplies were stored.

Hannibal again used his Numidians to bring on an action on ground of his own choosing, where he had facilities for preparing an ambush, from which a detachment could fall upon the flank and rear of his opponents at the crisis of the action. The Numidians were sent to lay waste the country in the neighbourhood of the Roman camp. Sempronius (who commanded the Romans) led out his cavalry and a large body of archers and drove them back to their lines, and after a heavy

skirmish Hannibal drew off his troops and left Sempronius elated with an apparent success.

In the night he placed his brother Mago with 2,000 picked soldiers, half infantry and half cavalry, in the bed of a water-course, in front of his right flank, where they were perfectly concealed. At the break of day, before the Romans had been able to eat their morning meal, he sent his Numidians across the river to threaten their camp, and to endeavour to entice them into a general action. Sempronius fell blindly into the trap. He sent his cavalry to attack the Numidians, ordered out 6,000 archers on foot to follow his horsemen, and at length in person led the remainder of his army out of their entrenchments. The success of the previous day had rendered him vainly confident. It was mid-winter, very cold, the Trebbia was swollen breast-high, the Romans were fasting. Hannibal awaited them on his own ground, his men warm and fresh and vigorous, well fed and in high spirits. In face of all this Sempronius led his men through the swollen stream, and with an army enfeebled with the cold, fought a general action with a river in his rear.

This battle of the Trebbia is a convincing proof of the fact that Hannibal owed nearly all his successes to his numerous and well led cavalry. When the Romans had followed the Numidians across the river, Hannibal sent on to the succour of his cavalry his light armed infantry, and the slingers from the Balearic Islands, numbering about 8,000 men, following closely himself at the head of the main army. He formed up his infantry, consisting of Gauls, Spaniards, and Africans, to the number of 20,000, in a single line in the phalanx order. The cavalry, including his Gallic allies, amounting to 10,000, were equally divided upon the wings, as also were his elephants.

Polybius, whose account we follow, says that "Sempronius recalled his cavalry, who fatigued themselves uselessly against the Numidians, who were skilful horsemen, accustomed to fly in disorder at the first shock, and to return as boldly to the charge the next moment." Sempronius formed his infantry in three lines, the cavalry 4,000 strong upon the wings.

The Roman velites were soon driven by the Carthaginian light armed troops through the intervals of their lines, as they had thrown away nearly all their darts and javelins in their skirmish with the Numidians in the early morning. The main lines then came into action, when the Carthaginian horsemen, more numerous and energetic, fell upon the Roman cavalry with such impetuosity that in an instant they were routed and driven in confusion off the field. Bodies of light

armed infantry and Numidians, who appear to have followed up and supported this charge of the heavy cavalry, fell upon the exposed flanks of the Roman legions, prevented them from defending themselves from the attack in front, and soon threw them into disorder.

At this moment Mago moving out from his ambush fell furiously upon the rear of the centre of the Roman line, the cavalry, turning from the pursuit, also joined in the attack, so that the flanks of the Roman army, their cavalry and their velites were utterly routed with heavy loss, and thrown back upon the river.

The Roman heavy armed infantry of the centre, however, proved themselves worthy of the great reputation they had so long maintained. At this crisis, they had the Carthaginian phalanx in good order in front of them (for Hannibal had evidently not pressed the action in the centre), both their wings had been defeated and driven off the field, their reserves had been routed, a fresh force issuing from an ambush was attacking them in the rear, the whole plain was swarming with victorious hostile cavalry, and a swollen river lay between them and their camp, and yet they never thought of surrender. The decision of the Roman consul was prompt, the discipline and obedience of the men perfect, and closing up their ranks and steadying their formation, they burst through the enemy's line of battle, defeated the whole centre of Hannibal's army, cut it asunder and forced their way clear through to Placentia. Scipio in the night with the débris of the army passed by the Carthaginian camp and joined Sempronius in that place.

This battle is a remarkable evidence of the admirable qualities of the Roman heavy armed legionary, and of the high character of the Carthaginian horse; nor can any doubt arise as to Hannibal owing his success entirely to his splendid cavalry.

Had the Roman Consul shown more skill in refusing to fight except under favourable auspices, had he occupied a position where the wings of his army would have been protected from being turned by the hostile horsemen, and where the wonderful skill, bravery, and steadiness of the Roman foot could have been employed to advantage, the result might have been different; for the Trebbia proved that the Carthaginian infantry could not withstand the attack of the heavy Roman legionaries.

An account of the battle of Cannæ, where Hannibal gained his most decisive victory over the largest and most powerful army that Rome had ever been able to bring into the field

against him, will give another illustration of the immense advantages which that great general was able to secure from the use of his cavalry in action.

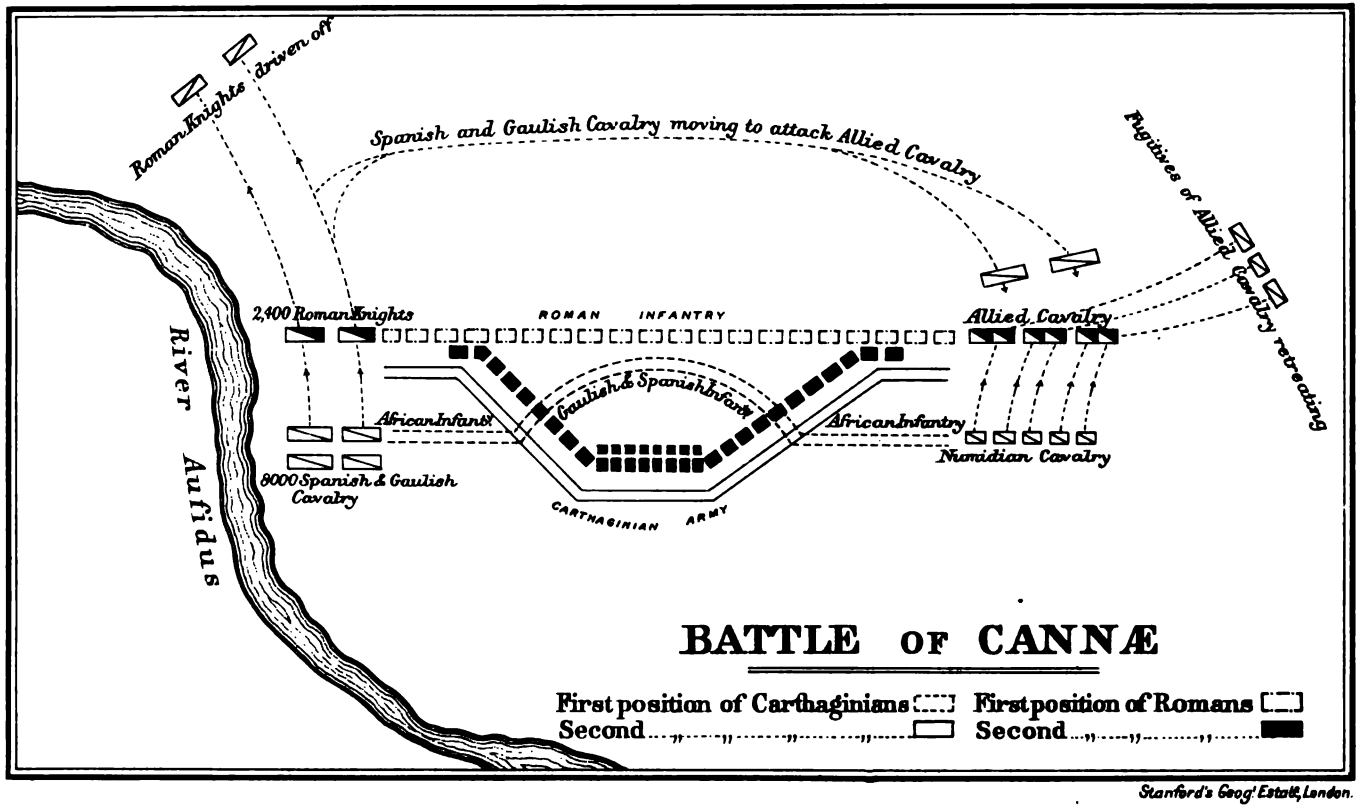
A few days before the battle a skirmish took place between Hannibal and his cavalry and light infantry, and the advanced guard of the Romans, which was commanded by the Consul Varro. At the first charge of the Carthaginian cavalry, which as usual was delivered with great vigour, the Romans were thrown into considerable confusion, and would have been utterly routed, but that Varro had placed some cohorts of legionary heavy armed infantry in the intervals of the cavalry. This precaution, says Polybius, gave him all the advantage in the combat.

At the battle of Cannæ, Hannibal's army was drawn up in a loop or bend of the river Aufidus. The heavy Gallic and Spanish cavalry, 8,000 strong, were placed on his extreme left, their left flank resting on the river; next to them were half of the African infantry. In the centre the Gallic and Spanish heavy armed foot were drawn up in heavy battalions (χιλιάρχη) about 1,024 men each. On their right came the other half of the African infantry, and next to them on the extreme right 2,000 Numidian cavalry.

The Roman army was formed up opposite to them. The Roman equites, 2,400 in number, were placed on the right wing, in front of Hannibal's 8,000 heavy cavalry. The infantry were in the centre, in the usual formation of three lines of *hastati*, *principes*, and *triarii* in maniples with intervals equal to their own front. The maniples were lessened in front, and the depth increased, so that they were sixteen ranks in depth by ten files in front. This was done to gain the advantage of the immense superiority in numbers on the side of the Romans. The cavalry of the allies were on the left, opposed to the Numidians.

The slingers, and other light troops of the Carthaginians as well as the light troops of the Romans, were placed in front of the main lines, and they opened the battle, fighting for a long time with much bravery, but without any decisive result.

Hannibal had not failed to notice the great efficiency of the Roman infantry, and attributing their value partly to their arms, he had given to his African veterans the arms and weapons he had captured from the Romans. The Gallic and the Spanish infantry, who were armed with bucklers and swords, were advanced by battalions in a species of double echelon from the centre. Polybius describes it as the convex of a crescent; the design being to commence the action with



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those troops, and to sustain it with the Africans, who, while holding a place in the main line, also partly served the purpose of a reserve.

While this was being done, Hannibal brought his cavalry into action. He ordered the 8,000 of his heavy cavalry on his left to charge the 2,400 Roman knights who were opposed to them. As may be supposed, the latter were instantly put to rout and driven headlong from the field. The Numidians were ordered meanwhile to simply keep in play the main body of the Roman allied horse, who were in their immediate front, to make demonstrations, but to avoid a decisive conflict as long as possible. The victorious Carthaginian horse having driven the Roman cavalry of the right from the field, wheeled around, and passing by the rear of the Roman army, charged the Roman allied horse in their rear, while the Numidians attacked them in front. The allied horsemen were cut to pieces.

In the meanwhile the Roman infantry had attacked the salient point of Hannibal's main line, had pressed it back to its original position and beyond it till the whole centre was bent back into a re-entering angle, into which the Roman infantry, elated with the success, were crowding onward. At this point the two bodies of African infantry wheeled inwards and attacked the Romans in flank as they pushed on. The cavalry of Hannibal, having destroyed the opposing horse, were free to aid their comrades of the infantry, and fell with great vigour upon the rear of the Roman legions. From that time it became a mere butchery, the loss of life being greater in proportion to the numbers engaged than in almost any battle of antiquity.

Hannibal's management of his cavalry in this action, as well as at the Trebbia, reminds us of the tactics of Alexander at Issus and at Arbela. The whole details of the fight at Cannæ, as given by the ancient historians, prove that the cavalry must have attained a very high degree of discipline, or they could never after a victorious charge have been kept so well in hand, have been recalled so readily, and so soon led again to the charge, to be again recalled, and again thrown into action.

His extraordinary skill displayed in the distribution of his cavalry, by which he opposed 8,000 to 2,400, and held back his Numidians on the left, until they were assisted by the victorious horse from the other wing, is beyond all praise, and proves how thoroughly he appreciated one of the best established principles of modern war, that of opposing masses of your own army to fractions of the enemy.

The wars with Hannibal and the numerous defeats suffered by the Romans through the want of good cavalry, soon caused them to make great efforts to supply the deficiency. Publius Scipio, the son of the Roman Consul who commanded at the battle of the Ticinus, was appointed to the command of the Roman armies in Spain, after the death of his father and uncle.[1] This great general, afterwards surnamed *Africanus*, the conqueror of Hannibal at Zama, was no sooner intrusted with high command than he devoted himself with energy to the improvement of the cavalry service.

The cavalry were modelled upon the Greek system, which was then considered the best. They were provided with the casque, the cuirass, the oblong buckler, boots, a double ironed lance, a javelin, and a curved sabre.[2] Scipio took the greatest pains to superintend personally their drill and exercises. We find from Polybius (who gives an account in the second chapter of the tenth book of the manœuvres that he introduced) that each horseman was taught individually to make the right or left about face or turn. The decuriæ and turmæ were exercised in wheeling to the right and left, then going about by files, and wheeling back again, so as to occupy the same ground as before the first wheel was made. They were accustomed also to wheel about, and to wheel three quarters right or left about, by turmæ. Sometimes also one or two files from the centre or flanks would be moved forward some distance, and the remainder pushed on at the gallop were exercised in ranging themselves exactly in the intervals. This manœuvre seems to have been designed more to impart steadiness to the troops than for any other purpose.

Scipio also drilled them in changing front upon one wing or the other by the flank march of the turmæ, or by oblique echelon; he considering that breaking into column and marching the whole column in the new direction and then fronting, was simply the same movement as a column of route, and was faulty, inasmuch as the different troops arrived so much more slowly into their respective positions.

He exercised his soldiers to advance as if upon the enemy, and to retreat in such a way that even at speed the order should not be broken, and that the intervals between the squadrons should always be maintained, for he considered nothing more useless and more dangerous than for cavalry to be led to the charge with their ranks disordered.

He inspected and drilled his cavalry personally, he made them move out of the town into fields, where he himself taught them all the movements he required them to learn,

[1] Liskenne, ii. 31. [2] Ibid.

and put them through all their exercises. In order the better to superintend their drill, he did not adopt the usual custom of the time and take up his position at the head of the troops, where all could see him and he could see none, but he maintained his authority over the soldiers by riding about everywhere among them, from squadron to squadron during their manœuvres, watching everything carefully, giving the most clear and detailed explanations to those who seemed to hesitate, and correcting faults where they were committed. Such was the care that Scipio took to have every individual soldier clearly understand his duty. Demetrius Phalereus speaking of this method says: "In an army the strength of the whole is composed of the strength and instruction of each company, and of each particular soldier."

Scipio reaped a full reward for the trouble he had taken with his horsemen, in his campaigns in Spain, and afterwards in the crowning achievement of his life, when at Zama, in one battle, he gained for his native land not only security from destruction but the empire of the world.

The Romans from the earliest times used the bridle and reins, but at this epoch had neither saddles nor stirrups. In place of the saddle, which was not used until about the year 340 A.D.,[1] and was not perfected until some fifty years later, under Theodosius the Great,[2] the Roman cavalry used a double covering or pad of cloth, hide, or skin;[3] the lower covering was larger than the upper, and was sometimes plain, sometimes bordered with a fringe. It was held in its place by a girth, a crupper, and a breast-leather or strap. Over it was a smaller pad, the lower edge of which was festooned and sometimes ornamented with tassels.[4] The breast-strap and crupper were also adorned with tassels, crescents, and other decorations. The two cloths or pads were fastened together by four buttons with straps, or else tied together with ribbons.[5] There were no stirrups in use until nearly 200 years after the invention of the saddle, or about the end of the sixth century.

Vegetius describes how the young soldiers were trained to vault upon their horses with a naked sword or spear in their hands, and this exercise, he says, was continually required from the oldest veterans as well as from the young recruits. They were taught this exercise first upon wooden horses and without arms, until they were somewhat accustomed to it, and then with arms.[6] These exercises were conducted in winter under cover, and in the summer on the drill ground.

[1] Bardin, 4809. [2] D'Aldeguier, 32. [3] Liskenne, ii. 34.
[4] Humbert, atlas plan, ii. [5] Liskenne, ii. 34. [6] Vegetius, i. ch. 18.

They were trained to mount from both the right and left sides.

Livy, book iv. chap. 33, in the account of the battle between the Romans under the Dictator Mamercus Æmilius and the Fidenæ, tells an extraordinary story of the Roman Master of Horse, Aulus Cornelius, introducing a new mode of fighting among the cavalry, by commanding his men to take the bridles off their horses, and leading them to the charge with unbridled steeds. Livy states that the plan was crowned with success. If this story has any truth in it, it is evident that Aulus Cornelius determined there should be no hesitation, but that the charge should be pushed home. It is a curious circumstance in this connection that General Hood, of the army of the late Confederate States of America, has always maintained that if the reins of the cavalry could be cut at the moment of the charge, the horses would break down the opposition of any infantry, and that the charge would always be successful.[1]

There is a difference of opinion about the shoeing of horses among the Romans. It is certain that they did not use the iron shoe fastened with nails in the modern fashion.[2] It is not known when shoes of that kind were first invented, or in what country they first came into use, but certainly not during the Roman period. In Greece, in the time of Xenophon, we have his positive testimony to prove that no horse-shoes of any kind were in use among the Greek cavalry, for his instructions as to the best means of hardening the hoof are very explicit.[3]

It is certain, however, that the Romans had conceived the idea of an artificial protection to the horse's hoof, for it is a well-established fact that mules and beasts of burden were sometimes provided with a metal or wooden shoe (called *solea*), which was held in its place by thongs of leather crossed over the hoof.[4] This, however, seems to have been the exception rather than the rule. Suetonius says that Nero employed 2,000 mules in drawing his equipages and train when he went to compete for the prize at the Olympic games, and that all these mules were provided with shoes consisting of a plate of silver attached to the hoof by thongs.[5] The mules used by Poppea are said, on the same authority, to have been shod with gold. All these statements prove the use of horse-shoes of one kind during the Empire, and although there is no direct testimony to prove that the horses of the cavalry were shod,

[1] Personal conversation. Modern Cavalry, 166. [2] Liskenne, ii. 35.
[3] Xenophon, Hipparchicus. [4] Liskenne, ii. 35. Bardin, 1080.
[5] Liskenne, ii. 34, 35.

and in spite of the silence of medals and monuments on the point, some commentators have assumed that the Romans would have been certain to be as attentive and careful as to their chargers' feet, to preserve them in good condition, as they would be with their baggage animals.

M. Liskenne argues that without shoes they could not have made the long and difficult marches that must have been necessary in an empire extending from Britain to the banks of the Tigris, and insists that they were supplied with shoes attached to the hoof, and so closely taking its form as not to cause them to be distinguished in monuments or medals.[1] Humbert agrees with M. Liskenne, and says distinctly that the cavalry horses used shoes.[2] Bardin does not seem to agree with these authorities, for he says generally that stirrups and horse-shoes were not used by the Roman cavalry.[3] The matter is one that cannot be settled satisfactorily, and must rest on conjecture under any circumstances. There may have been instances, and most likely there were instances, where cavalry horses were provided with the protection to the hoof which was given to draught animals, but it is hardly probable that it could have been an universal custom to shoe all cavalry horses, for if so, positive evidence of the fact would surely have been preserved in some way.

The earliest positive evidence of the use of horse-shoes nailed to the hoof is that furnished by the skeleton of a horse found in the tomb of Childeric I., with shoes fastened in that way. The tomb was accidentally discovered at Tournay in 1653.[4] Childeric reigned A.D. 458 to 481, so this fixes the date of horse-shoes as far back at least as 480.

The Roman cavalry attained its highest value under Scipio, and for a considerable period after his time it was maintained in a good state of efficiency. The division of the legion into maniples, and its usual formation with intervals between them gave facilities to the cavalry, drawn up as it was in such small tactical units as the turmæ, to charge through the openings upon the enemy, and so aid their infantry in the crisis of an action. A portion of the cavalry were generally held in reserve in the rear to give this assistance in case of need.

Scipio and Lentulus in Spain and Africa temporarily organised cohorts by simply uniting three maniples into a single body and using that larger corps as the tactical unit. This innovation was probably caused by the fact that Scipio was engaged with an enemy possessing a powerful and effective cavalry force, and had discovered that in operating against

[1] Liskenne, ii. 35. [2] Humbert, [illegible] [3] Bardin, [illegible]
[4] Boutell, 279. [5] Bardin, [illegible]

such a foe it was necessary to consolidate his infantry and reduce the number of intervals in his line of battle, at the same time that he increased and strengthened his tactical units.

The division of the legion into cohorts as a distinct and permanent organisation did not take place until the Consulate of Marius, when they became the regular sub-division, the legion containing 10 cohorts; and from that time, although differing in strength, the same name was maintained during the Empire.[1]

In the reign of Adrian the first cohort was increased, and was composed of the picked men of the legion, and was given many privileges which the other cohorts did not enjoy. It was generally double the strength of the others, and comprised 800, 1,000, or 1,200 men according as the legion was of the strength of 4,000, 5,000, or 6,000 men. The standard or eagle was entrusted to this cohort, which was called the *cohors milliaria*, and which also protected the images of the emperor.

The cavalry were placed generally upon the wings, the heavy armed being placed next to the infantry; next to them on the outer flank the light armed cavalry took up a position, to enable them either to protect the flanks of their own army or, if possible, to envelop and attack the flanks and rear of the enemy. A reserve of cavalry was generally kept in the rear after the formation of the legion into cohorts, which was also an organisation that enabled cavalry to give immediate support to the infantry when closely pressed.

SECTION IV.—CAMPAIGNS OF SCIPIO AFRICANUS—BATTLES OF ILING AND ZAMA AND THE MITHRIDATIC WAR.

The battle of Iling in Spain, between Scipio Africanus and Asdrubal, the son of Gisco, is generally considered to be the highest development of tactical skill in the history of the Roman army, and as such it merits close study, more particularly as the cavalry service performed a most important part in the action.

Asdrubal and Mago had in their army 70,000 infantry, 4,000 cavalry, and 32 elephants. Scipio was much weaker in numbers, his army consisting of 45,000 infantry and 3,000 horse. Asdrubal, having assembled his army in the spring of the year 205 B.C., marched to a town called Iling, or Elinga, and encamped in its vicinity at the foot of a mountain, where

[1] Roman Antiquities, Exercitus. Bardin, 1337, 1338.

he fortified his camp, and where he had in his front a plain very suitable for battle.[1]

Scipio's situation at this period was very critical, and gave him great uneasiness. His Roman legions alone were too weak for him to risk a general action against such a superior force, while he had not sufficient confidence in his Spanish allies to venture to employ them boldly in any decisive engagement. He decided, therefore, to appear to have every confidence in them to make the enemy believe that he trusted them fully, but at the moment of action to employ his own tried legions at the decisive points, leaving his allies as a mere stop-gap in the line of battle.

He therefore marched to within a league of the Carthaginian position and there encamped, but foreseeing that Asdrubal would be likely to molest his working parties in entrenching the camp, he had placed his cavalry in ambush behind a hill, from which concealment they charged suddenly upon Mago and Massanissa, who with the cavalry and Numidians came out to attack them.[2] The stratagem was crowned with success, and the Carthaginians were driven in confusion back to their own lines with heavy loss. This skirmish had the effect of inspiriting the Romans, and tended also to confirm the allegiance of their allies.

For several days the two armies remained opposite to each other, each day being drawn up in line of battle in the plain which lay between the camps, but without bringing on a general action,[3] the light troops alone at times having partial combats and skirmishes.

Scipio during several days had carefully marked the order in which Asdrubal had formed up his army, and had seen that his best troops, the African infantry, occupied the centre of the line, that his allies were on the flanks of the Africans, and the cavalry and elephants upon the wings. Asdrubal had evidently so drawn up his army, in order to oppose his best troops to the legions which usually occupied the centre of the Roman line of battle, and which were by far the bravest and best disciplined infantry of the age. He had seen Scipio's army day after day, with its long lines deployed upon the plain in their accustomed order, and had marked that the Spaniards, Scipio's latest and least trusted allies, were ranged upon the flanks.[4] His dispositions therefore to meet his opponent were the best that he could have adopted.

Scipio had moved out time after time purposely to deceive Asdrubal on this point, intending at the last moment to

[1] Polybius, xi. ch. 5. [2] Ibid. [3] Ibid. [4] Ibid.

change the formation to one that would take his enemy by surprise, and give to his own troops a marked advantage.

When the day arrived upon which Scipio had determined to risk the fate of a battle, he took every precaution that a skilful soldier could devise. His troops were early in motion. Special orders had been issued to the tribunes and officers to see that the men were all provided with breakfast, and armed and equipped ready to march before the day broke. The cavalry and light armed troops moved out first, followed by the main body, which was formed up on the plain in a new order, the Spaniards forming the centre of the line, while the Roman legions were equally divided upon the wings. The cavalry advanced up to the enemy's camp and threatened an attack. Asdrubal seeing the advance, and seeing in the distance the Roman army, in the dull light of the dawn, ranged upon the plain, sent out his light troops and cavalry in all haste, hurriedly equipped, and without food, to hold the Roman cavalry in check, while he himself with the remainder of his troops, also fasting, moved out and formed up in the usual order, his elephants being in front of the wings.

By this time the sun had risen, and Scipio's light troops retiring through the intervals formed up in rear of the wings, and exposed to Asdrubal's view the Roman army in its new and unaccustomed order. There was no time for him then to make any change in his dispositions. He saw that his Spanish allies would have to bear the brunt of the attack of the choicest troops in the ranks of his foe, and that the fate of the day might be decided by the result of that conflict.[1] He had not much time to think, however, for Scipio moved on him at once, and his manœuvres were certainly calculated to surprise him.

Scipio advanced, as already mentioned, with the Spanish allies in a species of phalanx formation in the centre—the Roman troops on the wings were formed in a close line, by placing the maniples of principes in the intervals between the hastati. The triarii were formed behind them as their rear ranks, so that each cohort was ranged in a species of close order, thirty-two files in front by twelve in depth. These had closed up after the velites and cavalry had retired through the intervals and formed in their rear, the velites behind the heavy infantry, the cavalry behind them. The velites were formed up in maniples with intervals. The cavalry, 1,500 on each wing, in squadrons of three turmæ, had also intervals between the squadrons.

The tactical arrangements for the battle had evidently been

[1] Polybius, xi. ch. 5.

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carefully prepared in advance, and explained to the officers. Scipio himself took command of the right wing and Julius Silanus that of the left. The whole Roman army then advanced in line, the Carthaginians moving forward to meet them, when at the distance of a few hundred yards the two wings wheeled outwards into columns and marched the right wing to the right, and the left to the left until the heads of the columns were opposite the respective flanks of the line of Carthaginian infantry, then the cohorts, wheeling right and left back into line, formed themselves in order of battle in front of the wings of the enemy, and with increased speed hastened on to the attack.[1] The columns of velites and cavalry did not halt in the outward march but moved on, and as soon as the heads of the columns cleared the flanks of the infantry each maniple of velites, and each squadron of cavalry, wheeling to the left on the right wing, and to the right on the left, by the simple manœuvre known as right and left form or "to the reverse flank right or left form," successively wheeled into line and moved up so that the troops were reversed, those on the right becoming the left, and *vice versâ*. By this means Scipio's line elongated itself on each flank, and overlapped and enveloped the flanks of the enemy.

In the meantime Scipio ordered the Spaniards to move very slowly (in fact he refused his centre), his order of battle being the double oblique, his two wings being thrown forward to commence the action. The battle was opened by his cavalry attacking the Carthaginian cavalry in front and flank, the velites who fought in the intervals attacking the elephants with such success that they were driven back upon their own lines, where they created a deal of injury. Scipio here reaped the reward of his great care in organising and training his cavalry, for they at once put the Numidian horsemen to rout and drove them from the field. The Roman legions in their heavy formation and steady discipline were more than a match for the Spanish auxiliaries, who, never equal to compete with them, were still less in a position to withstand them this day, being enfeebled as they were from want of food. They also were soon routed on both flanks with heavy loss.

During all this time while the battle was being decided Asdrubal's choicest troops stood in their ranks, idle spectators of a disaster that they could not prevent. Asdrubal feared to move his African infantry to the assistance of his wings, as the phalanx of Spanish allies in the centre of Scipio's army was moving slowly up, and ready in good order to take

[1] Polybius, xi. ch. 5.

advantage of the first false move, while it was still too far off for him to hazard an advance of his centre.

The African infantry maintained their high reputation, however, and when their wings were utterly disordered and in flight, they retired in good order, covering the retreat with their ranks well closed up, and so saved the débris of their army.

This action is worthy of close study, as it is without doubt that of all others in which the Romans displayed the greatest tactical ability. It proves that the Roman army must have acquired an extraordinary steadiness in manœuvring, and that Scipio must have been exceedingly confident in the power of his army to manœuvre, or he would never have dared to attempt so complicated a movement in the face of an active enemy well supplied with an efficient force of cavalry.

The care that Scipio took in personally drilling and exercising his cavalry evidently made them a highly trained force, and he has known exactly how far he could trust to them. The same confidence in the ability of his army to manœuvre led Frederick the Great to adopt the oblique formation, for he found he could do with impunity what no other army of his age could attempt without extreme risk of disaster.

Another interesting feature in connection with this battle is in comparing it with some of Hannibal's, and tracing the effect of Hannibal's generalship in training his opponents. Twelve years before, Scipio was a lad of seventeen accompanying his father, who was then commanding the Roman army as one of the consuls in the first skirmish of the war on the banks of the Ticinus. He was also in the battle a short time after at the Trebbia, and two years later fought again in the disastrous field of Cannæ. He had seen in his first action the Roman cavalry defeated by the invading horse, and his father (whose life he is said to have saved by the most brilliant gallantry) severely wounded, and saving the remains of his routed army with the greatest difficulty. The bitter experience of his first battle evidently taught him for life the value of well-trained horsemen. At the Trebbia, where he doubtless was also engaged, he saw another crushing defeat suffered by his countrymen, and saw that it was caused by the cavalry (the weakest of the Roman troops) being overwhelmed upon the wings, while the centre, where the main strength of the Romans lay, could not effect anything before the fate of the battle was decided. At Cannæ he had again seen ruin and disaster fall upon his people by the superior cavalry, and the more skilful tactics of the great Carthaginian leader. The effect of this hard practical experience showed

itself from the outset of Scipio's career as a general. His first idea was to perfect his cavalry as we have already seen; and when he was obliged to fight an action, the memory of his cold, enfeebled, and fasting comrades at the Trebbia rose up before him, and imitating the tactics of his father's opponent, he forced the enemy into action fasting, refused his centre composed of inferior troops, opened the battle by overlapping the wings of his foe with his carefully disciplined horsemen, and won a brilliant victory, one that in its main features is but a repetition of his first general engagement, with the parts and the results reversed.

The consequences of the battle of Iling were the conquest of Spain, and the evacuation of the whole country by the Carthaginians. Within four years Scipio had carried the war into Africa, and after a considerable amount of fighting Hannibal had been recalled from Italy, and both of the contending parties gathered their strength for a final and decisive battle, which it was felt would decide to whom should belong the empire of the then known world.

This battle, one of the most important in its results, and one of the most decisive, took place near Zama, a village about five days' march to the south-west of Carthage, in the year 202 B.C.

Scipio's army consisted it is supposed of about 40,000 men, although the records are obscure upon the point, but in his army he counted 6,000 infantry, and 6,000 Numidian cavalry, which Massanissa had brought to his standard shortly before the action.[1] Hannibal is supposed to have had about 2,700 newly-raised, and not very efficient Carthaginian horse, 2,000 Numidian cavalry only, about 50,000 infantry, and 80 elephants.

Here, again, we see that the flight of years had brought many changes, and that the relative strength of the cavalry in the Roman and Carthaginian armies had been reversed, since Hannibal, sixteen years previously, in the vigour of his early manhood, had first met his Roman enemies in battle array. He had 24,000 of the veteran infantry who had served with him so long in Italy, and had acquired such steadiness of discipline, and such skill in the use of their weapons, as made them equal to the best Roman legions. His cavalry were weak in numbers, newly raised, and poorly equipped, while of Numidian horsemen he had but 2,000. Scipio, on the other hand, had a force of cavalry trained with the greatest care, well armed, and in the highest state of efficiency. Hannibal must have known this, but what must have been his thoughts

[1] Lecomte, 109.

when he saw ranged against him 6,000 Numidian cavalry, men whose value he appreciated so well, the force upon which he had relied so much in his early wars, the force which had never failed him in action, and to which he owed his success in so many battles, and his army, food and safety in so many campaigns.

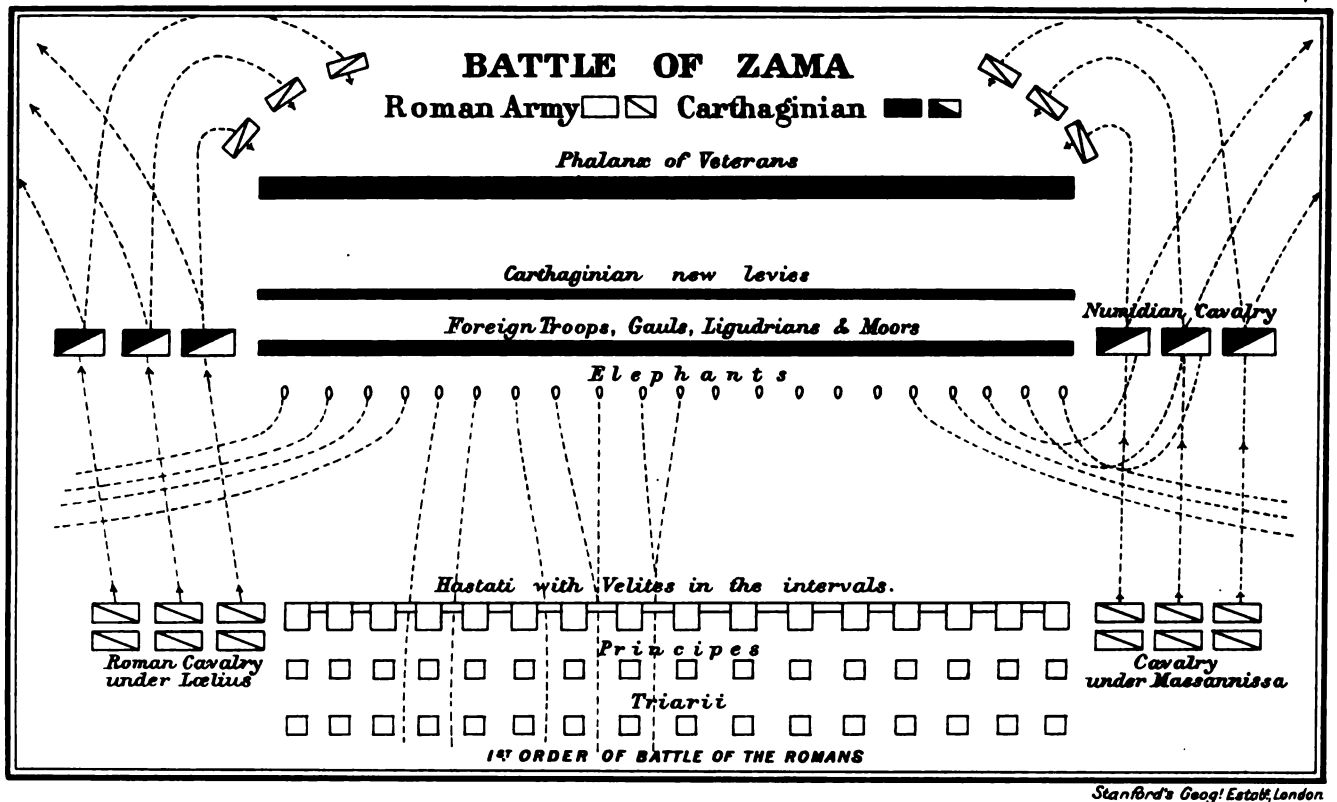
Hannibal ranged his army in three lines, or phalanges, for he injudiciously drew up his men without intervals. The eighty elephants were placed along the front, 12,000 Ligurian, Gallic, and other mercenaries formed the first line, the new levies of Africans and Carthaginians were drawn up in a second, close behind the first, while Hannibal's veterans from Italy, 24,000 strong, acted as a reserve, and were ranged in one line without intervals at some distance to the rear, so that fugitives from the front might retire around the flanks; the native cavalry he placed on his right wing; the 2,000 Numidian horse on his left.[1]

Scipio, who was a great master of the art of war, and who proved his great ability in nothing more than in the originality with which he made necessary changes in organisation and tactics without any regard to custom or precedent, formed his infantry in three lines as usual, but placed the cohorts of the principes exactly behind the cohorts of the hastati, and the triarii behind them, so that his army was virtually formed in a line of columns with intervals between them. The intervals were filled, in line with the front rank, with the velites, so that from Hannibal's position the Roman army would appear to be drawn up in a phalanx without intervals. This disposition was made by Scipio to leave openings for the elephants to get through, or to be driven through to the rear by the velites and other light troops, who were especially charged with that service.[2]

The Roman cavalry, under Lælius, was on the left flank, while Massanissa, King of Numidia, with his 6,000 horsemen, fought upon the right. The cavalry skirmished against each other for a time, but Scipio, wishing to get rid of the elephants before moving his infantry, stood firm, until Hannibal opened the action by ordering them to advance. The noise of the Roman trumpets frightened the elephants, and put them in confusion, the velites attacked them with javelins, the cavalry also set upon them, so that some were driven through the openings Scipio had left in his line; some were driven by the flanks off the field, and some in their terror turned and broke through the cavalry on the left of Hannibal's army, throwing them into disorder. Massanissa saw the opportunity, and

[1] Polybius, xv. 1. [2] Ibid.

To face p. 81.



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with the skill of an old and experienced cavalry officer, charged at once impetuously upon them, and drove them at the first onset in utter rout from the field. Lælius, superior to the cavalry in his front, was equally successful, and pursued the fugitive horsemen with great vigour.

In the meantime the infantry had come into action. The mercenaries of the first line were soon hardly pressed and not being well supported by the Carthaginians in the line behind, believing themselves betrayed, fell back, and even attacked their supports, so that there was great confusion, and many were slain, the hastati being also somewhat disordered by the intensity of the struggle. They were supported by the principes, and soon regained their steadiness.[1] Hannibal, seeing the fugitives flying towards his reserves, and fearing these might also be thrown into confusion, ordered his veterans to present their pikes, and compel the routed troops to escape around the flanks.

Scipio recalled his hastati from the pursuit, formed them up again, and moved up his principes and triarii on the wings in line with them, and then another battle commenced between Hannibal's veterans and the Roman infantry. Polybius says, "The numbers, the resolution, the arms of the two sides were equal, and they fought with such obstinacy that they died in the ranks where they fought, and no one could judge which would have the advantage," when Lælius and Massanissa, leading back their victorious horse from the pursuit, fell upon the rear of Hannibal's phalanx at the crisis of the struggle, when the fate of the battle was trembling in the balance. This turned the scale. The Carthaginians were utterly routed, for the plain in which the combat took place left them at the mercy of the cavalry, who pursued them with unrelenting vigour. Hannibal escaped with difficulty, and thus ended this great action which, as Polybius says, made the Romans masters of the world.

There is no doubt that this battle was won by the cavalry, which was thrown into action very skilfully at the proper moment, and was most ably led by the two generals in command, who by their return from the pursuit in order to take part in the action where the decisive result was to be gained, proved themselves to be cavalry commanders of the highest type.

The Roman cavalry at the close of the second Punic War was in the finest condition, and its uses were better appreciated and understood than at any other period of Roman history. Afterwards it was much more numerous in their

[1] Polybius, xv. 1.

charged the enemy in flank.[1] They were ordered to make no use of their javelins, to ride sword in hand, to come to close action at once, and to strike at nothing but the shafts of their opponents' lances, as when those were broken, the horsemen, immured in iron and without other weapons, were helpless. This done they were to strike with their sabres at their enemies' legs and thighs, which alone of their bodies were unarmed.

This bold charge of a small body of horse led by Lucullus himself and supported by two cohorts of picked infantry, was crowned with complete success. The heavy armed horsemen, clumsy and slow in their movements, struck violently on the flank, broke at once in confusion, and were doubled up and driven in upon the infantry, so that in a few minutes the whole army was in flight. Tigranes, utterly astounded and struck with panic, was one of the first to ride off with a few attendants. It seems hardly credible, yet Plutarch states that the Romans lost but five killed and one hundred wounded, while of the foot of the enemy 100,000 were slain in addition to a great proportion of the cavalry.[2]

This action serves to show clearly that discipline and facility of manœuvring are absolutely necessary to give cavalry its great value. There is little doubt that the immense swarms of horsemen under Tigranes, although probably well mounted, well armed, and skilful riders, were yet only sufficiently drilled to advance in the attack, and to retire, but had never been accustomed to manœuvre, and were quite unable, when threatened on their flank, to make a sudden change of front, so as to face their enemy, and if necessary, meet him with a charge.

Unable to manœuvre, and struck on the flank where they could not resist, the novelty of the danger, and their ignorance of the means to remedy it, naturally left to them no resource but flight.

In the battle of Artaxata (67 B.C.) in the Mithridatic war, when Lucullus again fought against King Tigranes, he used his cavalry with considerable ability. Tigranes had posted in front of his army a large body of his best heavy cavalry, supported by some light squadrons of Mardian archers, and Iberian spearmen, in whose courage and skill he placed more confidence than in any of his other horsemen.[3] Lucullus sent his cavalry across the river Arsanias first to attack these advanced troops, and so to cover the passage of the river by his infantry. The Roman cavalry defeated the hostile horse at the first onset, and pursued them in different directions.

[1] Plutarch, Life of Lucullus. [2] Ibid. [3] Ibid.

Lucullus at once recalled them from the pursuit, to aid him in the action with the remainder of the enemy's forces, and leading a charge in person against the body of royal guards that were around the king, put them instantly to flight, and a complete victory ensued.

SECTION V.—CAVALRY UNDER JULIUS CÆSAR—BATTLE OF PHARSALIA.

The battle of Pharsalia, B.C. 48, is interesting as illustrating a certain reaction in the success of the turning movements by cavalry, and showing how Julius Cæsar, that consummate master of the art of war, adopted precautions which protected him successfully against the flank attack of an immensely superior force of cavalry, a manœuvre that during one hundred and fifty years before his time had almost invariably secured the victory to the general who skilfully employed it.

The two armies met on the plain of Pharsalia near the river Enipeus. Pompey drew up his forces with his right resting on the river, having 600 horse only on that flank, his infantry were in the centre of his line, and the remainder of his cavalry, being the great bulk of it, was massed upon his left wing, for the purpose of turning Cæsar's right in the action, and throwing him back upon the river. His dispositions were skilful, but he should have held a reserve of cavalry in hand, especially as he was so superior in that arm, and as victory generally inclines, in cavalry actions, to that side which can bring the last reserves into action.[1]

His army was much more numerous than that of Cæsar. He had 7,000 horse, and 45,000 infantry. Cæsar had only 1,000 Roman cavalry, and 22,000 infantry, but he formed his army with wonderful ability.[2] His left rested on the river, and consisted of the eighth and ninth legions under the command of Antony.[3] In the centre Cnæus Domitius commanded the cohorts, while on the right, Cæsar's favourite corps, the tenth legion, was drawn up under the command of P. Sylla. These corps were formed in three lines, forty cohorts being in the first, twenty-four in the second, and only sixteen in the third. Each legion formed part of all three lines. The cavalry, only 1,000 strong, were placed on the right in line with the front rank at a short distance from it, facing over 6,000 of Pompey's cavalry which we have seen were massed there.

Cæsar, knowing from the disposition of the hostile army that Pompey designed to envelop his right with his cavalry,

[1] Plutarch, Pompey and Cæsar. [2] Liskenne, ii. 301. [3] Lecomte, 156.

moved six of his best cohorts from his third line and placed them in rear of his right wing.[1] He explained to them that they were not to stir until the attack commenced, so that their presence should not be discovered.

When the attack opened, Cæsar's cavalry did not make any resistance, but at once fell back into a position at right angles to the front of battle, and to the right of the six cohorts containing 3,000 infantry, who had at once changed front to the right to face the advancing cavalry.[2] These brave infantry seem to have charged the horsemen with great courage, not throwing their javelins but using them as spears according to Plutarch, and thrusting them at the faces of the horsemen as Cæsar had commanded them. The cavalry, strange to say, were defeated at once by these cohorts, and fled in disorder, abandoning a large number of slingers and archers who fought with them and who were at once put to the sword. Cæsar's cavalry, which had held back on the right of the cohorts until their onset had checked and confused the hostile horse, immediately charged boldly upon them, completed the rout and continued the pursuit when they fled.

The victorious infantry wheeled to the left, advanced upon the uncovered flank of Pompey's infantry, and wheeling again to the left, overlapped it, and charged them in flank and rear at the same instant that the tenth legion pressed upon them in front. The result was not long doubtful. Pompey saw at once that the day was lost, and turned in flight to his camp, from which he again fled shortly after, on Cæsar following the *débris* of his army into their lines and storming them.[3] Pompey's loss in this action was 15,000 killed and 24,000 taken prisoners. Cæsar lost about 200 soldiers and thirty centurions.

Cæsar's dispositions to guard himself as much as possible from the turning movement which he foresaw was intended, and which he had so much reason to dread, were ably conceived, and show great marks of genius. He felt that all would depend upon the firmness and steadiness of the six cohorts, and his refusing to let his own cavalry come into action until after Pompey's horse had made their charge upon the infantry proves that he understood the value of the last reserves in a cavalry action, and shows how ingeniously he contrived, with only one-sixth of the enemy's force, to be virtually able to throw 1,000 fresh horsemen into the fight to turn the scale in his favour at the crisis of it.

[1] Liskenne, ii. 301. [2] Plutarch, Cæsar and Pompey. [3] Plutarch.

SECTION VI.—FOREIGN CAVALRY IN THE ROMAN ARMIES.

Before following the history of the Roman cavalry further, it will be desirable at this point to refer briefly to the cavalry of Gaul, Spain, and Germany, as those nations produced mounted troops that both in alliance with Rome and in the ranks of her enemies gained a high reputation on many a hard-fought field.

The Gauls were noted from the earliest times as furnishing good cavalry. Strabo says that their cavalry was much better than their infantry.[1] They used war-chariots at a very early period.[2] According to Livy, when Ambigatus sent his nephew Bellovesus to found a colony in Italy in the reign of Tarquinius Priscus, he set out with a large force of both horse and foot, and established himself in the neighbourhood of Milan.[3] Many years afterwards, when Brennus captured Rome, he had, according to Livy, a great number of cavalry, who spread over the country, and performed the duties of advanced guards, patrols, and reconnoitring parties very efficiently.[4]

In the invasion of Italy by the Gauls, which took place in the year 227 B.C., their army consisted of 50,000 foot, 20,000 cavalry, and a large number of war-chariots.

The Gauls estimated their cavalry at much higher value than their infantry. They used every effort to secure fine horses, and paid very high prices for them.[5] They were armed with a javelin and a long sword without a point, and sometimes with bows and arrows, and at first used only the casque and the buckler, the legs and feet being naked and the body covered with a sack or tunic of leather.[6] They afterwards wore large trousers, a shirt with sleeves, and the tunic over them. The mass of the people wore the whole beard, the chiefs and nobles the moustache only.[7]

The Gauls afterwards adopted heavier defensive armour, and are said to have invented the cuirass of iron, which they used to a great extent in later years.[8] The casque was ornamented with horns of the deer, or a metal crest with a thick plume of feathers, which added to the appearance of the soldier.[9] The buckler, which was rather small, was also adorned with devices.

Soon the Gauls, in imitation of the Romans, borrowed the heavy armour and equipment of the Greek cataphracti.[10]

[1] Bardin, 3499. [2] Duparcq, 201. [3] Livy, v. [4] Ibid. 37, 39.
[5] Cæsar, iv. 2. [6] Humbert, 40. [7] Duparcq, 202.
[8] Ibid. Bardin, 1767. [9] Duparcq, 202. [10] Humbert, 41.

There was also a species of cavalry called *crupellarii* by Tacitus, who were, according to Roquefort, soldiers or gladiators armed in full armour from head to foot, and appear to have been more heavily armed than the cataphracti. These crupellarii, however, are but rarely mentioned.[1]

The Gauls had very little tactical skill. They usually occupied the wings with their cavalry, although sometimes the chariots were placed on the outer flanks.[2] They formed in one line of battle, and do not appear to have used reserves. They sometimes massed their army in square, closing the bucklers together, so as to make an impenetrable formation.[3]

The tactics of the cavalry were based upon the proper principle. Their main idea was to succeed by the rapidity and force of the charge, which was usually made in a compact mass by the heavy cavalry in order to burst through the enemy's lines, and so make an opening by which the light cavalry getting through might fall upon their opponents in flank and rear.[4]

Some of the tribes of the Gauls had a cavalry that was organised in little troops or bands of three each, composed of a cavalier, or principal combatant, and two assistants or esquires. Pausanius says that the cavalry of Brennus was organised in this way, the intention being that if the horse of the chief soldier was killed, he could have it replaced by one of those ridden by his attendants, or if he himself was killed, that his place might be filled by one of his followers. We see in this the origin of the "lance" or "lance fournie" of the middle ages.[5] These small parties were called "Trimacresie."

Hannibal had a large force of Gaulish auxiliaries in his army, and they formed a portion of the cavalry which we have seen did him such good service in the campaigns in Italy.[6]

Cæsar also, on taking the command in Gaul, immediately made great efforts to organise a powerful force of cavalry, which he was enabled to raise to the number of 4,000.[7] They were composed entirely of Gaulish allies, in whom at first he did not place implicit confidence, for we see that in the interview he held with Ariovistus, where it was arranged that he should only be accompanied by 500 horse, he mounted that number of his best infantry from the 10th legion on the horses of his allies, and took them with him.[8]

Afterwards, in the action in which he defeated Ariovistus,

[1] Bardin, 1765. [2] Humbert, 41. [3] Duparcq, 203. [4] Humbert, 41.
[5] Bardin, 5124. [6] Ambert, 178. [7] Cæsar, i. 15.
[8] Liskenne, ii. 204. Cæsar, i. 42.

he used his cavalry with great effect in the pursuit, which seems to have been maintained by them for fifty miles, and in which heavy loss was inflicted upon the fugitive Germans.[1]

During the wars in Gaul, Cæsar had increased his cavalry to 10,000, but a portion of them consisted of German, Spanish, and Numidian auxiliaries. For a long period afterwards the Gauls furnished the greater part of the cavalry of the Roman armies.[2] Lucullus had a force of Gaulish horsemen, as already mentioned, at the battle of Tigranocerta.[3]

Vercingetorix, the Gaulish chieftain who led the great revolt against Cæsar, used his cavalry very extensively, and evinced a remarkable knowledge of the value and uses of a mounted force. Cæsar says that upon his appointment as leader of the army of the Gauls, he set himself to obtain above everything a good corps of cavalry.[4]

After Cæsar, by his rapid movements, had gained two or three slight successes, Vercingetorix called his council together, and suggested, as they were superior to the Romans in cavalry, that they should not employ that force in any general engagement, but simply to ravage the country around Cæsar, to cut off his foraging parties, to destroy all provisions, to burn the villages, to leave the country a desert, and to besiege the Roman army with an intangible cordon of horsemen, and so to starve it into submission.[5] This resolution was adopted, and for a time acted upon. Twenty villages and towns were burnt in one day, and if the Gauls had persisted in the plan, and carried it out as vigorously and as energetically as it was carried out against their descendants by the Russians in 1812, there is little doubt that the result to Cæsar would have been almost as disastrous as the campaign of 1812 was to the great Napoleon.[6]

Vercingetorix was induced against his will to spare Avaricum, and to rely more upon operations in the field.[7] Avaricum was, however, taken, and 40,000 of its inhabitants destroyed. Vercingetorix then demanded 15,000 cavalry, and continued to destroy the provisions, to burn houses, and to cut off convoys.[8] Cæsar, seeing the danger he was in, decided to fall back nearer to the Roman provinces, which were his base of operations. Vercingetorix, impatient in disposition, and believing that Cæsar's army was in flight, risked a general engagement, in which he was beaten with immense loss.[9] He thereupon threw himself into Alesia, which was then considered almost impregnable, and awaited

[1] Cæsar, i. 53. [2] Liskenne, ii. 209. [3] Cæsar, vii. 13. [4] Ibid. 4.
[5] Ibid. 14. [6] Ibid. 15. [7] Ibid. 28. [8] Ibid. 68. [9] Ibid. 66.

an attack. Cæsar decided to blockade him in that place, and by strong lines of countervallation reduce him by famine.[1]

Vercingetorix still used his cavalry skilfully. Before Cæsar could completely close in his lines, the Gaulish cavalry, 15,000 strong, cut through without difficulty, and were directed to raise a large army with which to come to the relief of the besieged.[2] Cæsar had by this time recruited among the Germans 10,000 cavalry, and his infantry reached 70,000 or 80,000 more. Before the aid came to the Gauls, Cæsar's lines of circumvallation were so strong that Alesia could not be relieved, and soon surrendered at discretion. Had Vercingetorix been permitted to carry out his own plans, and been opposed by anyone of less ability than the great Cæsar himself, the fate of the Gallic revolt would probably have been very different.

THE GERMANS were a warlike people. Their principal force consisted of the infantry, although they also used cavalry.[3] They were poorly supplied with defensive armour, and wore dresses made of skins badly shaped, and which were not large enough to cover the whole body, so that although living in a cold climate they were half naked.[4] The cavalry and infantry were similarly equipped. They used bucklers made of wickerwork, and ornamented with brilliant colours. They were sometimes round, but generally elongated; the horseman using one somewhat smaller than that of the foot-soldier. Although they had often fought against the Romans, and obtained spoils of armour from the slain or the prisoners, and although traders from Rome and neighbouring countries were welcomed among them, it is strange that they did not improve their defensive armour, for they appear to have rarely or never used the cuirass or helmet.[5]

Their offensive weapons consisted simply of a lance, or small pike, called a *framea*, which had a short point of iron sharpened. It was used as a lance generally, although sometimes thrown as a javelin. The right to carry this weapon was bestowed upon no one who was not worthy or qualified to bear arms, so that when a young man arrived at the age when he was considered able to take his place in the ranks, one of the chiefs, or some relative, handed to him in the public assembly the framea and the buckler.[6] This public ceremony made him a soldier, and seems to have given him a vote in the assemblies, for the people were always under arms when discussing any public affairs.[7]

[1] Cæsar, vii. 68. [2] Ibid. 71. [3] Boutaric, 46. [4] Cæsar, iv. 1.
[5] Duparcq, 212. [6] Boutaric, 46. [7] Bardin, 2412.

Their horses were not very good, nor were they in the habit of buying valuable animals, as seems to have been the custom among the Gauls. They preferred their own native horses, which were of a very poor quality, but which by continual exercise they were able to render very hardy and useful.[1]

The German cavalry often leaped from their horses to fight on foot like the early Romans, and they taught them to stand steady until they returned to them. They rode them without pad or saddle-cloth of any kind, and dismounted and remounted with surprising agility. The custom of using pads to ride upon was considered among them as a gross luxury, and a shameful evidence of effeminacy; so much so, that no matter how few they were, they would attack without hesitation a large body of cavalry equipped with saddle-cloth and pads.[2]

An instance of this occurred when Cæsar was fighting against the Suevi, who invaded Gaul in great numbers in the year 55 B.C. A skirmish took place near the river Meuse between 800 of the German cavalry and 5,000 of Cæsar's horsemen. The Germans were not the least impressed by the difference in numbers, but commenced the attack at once, put the Gaulish cavalry into confusion and then dismounted and fought on foot among their mounted enemies, killing their horses, throwing them to the ground, and putting them to flight.[3] Cæsar's cavalry in this action, though immensely superior in numbers, was completely defeated with heavy loss. So demoralised were they by this skirmish, that Cæsar, when marching against the enemy the next day, placed his cavalry in the rear-guard.

In the year 58 B.C., when Ariovistus was at war with the Romans under Cæsar in Gaul, he had in his army a corps of 6,000 cavalry, to which were attached 6,000 chosen infantry, so that they should support each other. If a horseman fell wounded from his horse the foot soldiers surrounded and protected him, and one of them mounted the horse if it was still unwounded.[4] These infantry men were exceedingly agile and skilful, and by holding to the manes of the horses to aid them, they could keep up with the cavalry in their most rapid manœuvres. This force was very useful in skirmishes of cavalry, their skill and endurance being great, and the weapons of the age being suitable only for close fighting.

Later in the war in Gaul, when Vercingetorix had drawn most of the Gallic tribes into the revolt against the Romans, it became necessary for Cæsar to look elsewhere for allies

[1] Cæsar, iv. 2. [2] Ibid. [3] Ibid. 12, 13. [4] Ibid. i. 48.

to furnish him with cavalry. We find that in the action before Neuvi, in 52 B.C., Cæsar used 600 German cavalry who had served under him since the commencement of the war. He says in his Commentaries, that the cavalry of Vercingetorix could not stand against them, but were defeated and driven back to their main body.[1] As, however, Cæsar threw them into action as a reserve, after the fight had been going on for some time between his other cavalry and the enemy's horse, it is doubtful whether the success is not to be attributed more to the fact of a fresh body being thrown into the action at its crisis, rather than to any superior qualities on the part of the German horsemen.

Cæsar, who had seen that the Gauls were very superior to him in cavalry and light troops, and that he was surrounded by a hostile population, and unable to obtain any assistance in the shape of a mounted force from either Italy or the Roman provinces, turned towards Germany for support, and sent across the Rhine to those nations that he had pacified in the preceding years, and asked them to furnish him with the cavalry and light infantry of their armies.[2] When they arrived, however, they were in a wretched condition, the horses being in many instances unfit for service. He made great efforts to render them efficient, and distributed among them the horses that happened to be in his lines belonging to the tribunes, the other officers, and the veterans. He also obtained horses wherever he could so as to have them thoroughly supplied; so successful was he in this endeavour, that he very soon had a numerous and most efficient corps of German horsemen. Appian of Alexandria says they numbered as high as 10,000 men.[3]

Afterwards, when the Romans carried on their offensive wars against the Germans, which lasted for nearly two hundred years, the constant campaigning against a much more skilful foe taught the Germans many lessons in the art of war.[4] They gradually adopted better arms, and defensive armour, and improved their system of tactics to a great extent, so that in time the war on their part, instead of being defensive, became aggressive, and after that it may be said that the Germans, more than any other people, contributed to weaken and destroy the Roman Empire of the West.[5]

THE GOTHS were a portion of the German people and had a high military reputation. The Visigoths had but few cavalry, while the Ostrogoths maintained a numerous body of horsemen in their armies. Theodoric, invading Italy in 489,

[1] Cæsar, vii. 13. [2] Ibid. 65. [3] Liskenne, ii. 250.
[4] Humbert, 43. [5] Duparcq, 216.

had an effective force of that arm, and after having conquered Northern Italy he established at Ravenna, his capital, a system of military instruction for his cavalry. He set the example himself to his young men, and taught them to excel in the use, not only of the lance and sword, but of the missile weapons which they seemed inclined to neglect. They were continually exercised, and reviews were periodically held in order that they should be maintained in a proper state of efficiency.[1] They were clad originally in skins of beasts, as were the other Germans, and carried a buckler and lance. In later times they used various other arms, such as the sword, the bow, and the battle-axe.[2]

THE VANDALS, another German race, used the lance and sword only, and after their conquest at Carthage fought always as horsemen, in order that they might more rapidly ruin and devastate a country. They employed Moorish mercenaries as archers,[3] and under Genseric always embarked a sufficient number of horses upon their numerous vessels, when they were engaged in their piratical expeditions,[4] and upon arriving upon a coast disembarked their chargers, mounted them, and spread over the country, creating general consternation, destroying everything and retiring to their fleets, after having hurriedly gathered all the spoils within reach.[5]

THE FRANKS at first fought altogether on foot, but after their conquests, having discovered the value of cavalry, they raised among the Gauls a force of auxiliary horsemen.[6] There is no proof that cavalry were used by them at the battle of Soissons in 486, but in the year 496 Clovis, at the head of his cavalry, completely defeated the Germans at Tolbiac. In subsequent years the Gaulish cavalry decided the fate of many actions fought by his successors.[7]

THE SPANISH CAVALRY. The Spaniards in the early times were armed (as were the cavalry of nearly all the nations of antiquity) with a lance pointed with iron, which, while used in the hand to thrust, was still available to throw as a projectile in case of need.[8] They also used a good cut-and-thrust sword, and seem to have been the inventors of that particular kind of weapon—for Polybius says that the Roman legions in his time were armed with the Spanish sword.[9] They used the poignard also. For defensive armour they wore a species of casque with a visor fixed under the chin, and a crest adorned with red feathers or horsehair, a garment of

[1] Gibbon, iv. 15. [2] Humbert, 44. [3] Duparcq, 218. [4] Gibbon, iii. 486.
[5] Humbert, 45. [6] Ibid. [7] Mottin, 215. [8] Duparcq, 195, 196.
[9] Polybius, vi. 4.

linen quilted and thick, a leathern cuirass, and a buckler made of sinews and hide.

There was one species of Spanish cavalry who were accompanied in action, as those of the Germans already mentioned, by an equal number of foot-soldiers, but it was their custom to mount behind the horsemen, and ride double in order that they might move rapidly to any decisive point, and then the infantry alighting, the two arms mutually supported each other.[1]

It was also the custom among them that if the infantry thus carried were closely pressed and required a reinforcement of foot-soldiers, the cavalry were trained to dismount, to fasten their horses by pickets which were attached to the bridles, and which they drove into the ground, and to form up in line alongside of their comrades.[2]

This gave the idea of voltigeurs, which were organised in the French army at Boulogne in 1804, to be drilled and manœuvred on this principle. The experiment was soon abandoned.

Hannibal enrolled a number of Spanish cavalry in his army on leaving Spain for Italy, and at the battle of the Ticinus, they fought armed with cuirasses, their horses being supplied with bits.[3]

It was customary among the Spaniards to place the cavalry in the rear, as a reserve to be employed as soon as the infantry had gained any success, in order to fall upon the enemy while in confusion, and to pursue them when in flight.

Livy says that the Spanish cavalry often prevailed over the Numidians, but in face of this statement it is nevertheless generally admitted that the Spanish cavalry were not equal either to the Gaulish or Carthaginian horse. Their infantry must have been of good quality, for Quintius Sertorius, the Roman general, preferred them to the Roman troops, particularly for the defence of fortified posts.

SECTION VII.—PARTHIAN CAVALRY.

During the time that Julius Cæsar was pursuing his conquests in Gaul and Britain, and adding great stretches of territory to the Roman Empire in that direction, a war was being waged at the other extremity of the then known world, in which the Romans were attempting to extend their power to its furthest limits. The success of Julius

[1] Duparcq, 197. [2] Ibid. 195. [3] Ibid. 197

Cæsar was not more marked in the west, than was the failure of Crassus in the east.

The defeat of Crassus was probably the most serious blow that a Roman army had ever suffered since the mournful day of Cannæ. And it is a curious circumstance that in this second disaster the Romans again owed all their ill success to the superiority of the hostile cavalry. In Parthia the inhabitants carried out successfully the same idea of harassing their invader with mounted men that Vercingetorix had conceived about the same period, but had been unable to put into execution.

Crassus marched into Parthia in B.C. 53 with an army consisting of seven legions, about 35,000 men with 4,000 cavalry and nearly 4,000 light infantry.[1] Instead of marching through the mountainous parts of Armenia where he would have been among a friendly people, and where his force could have operated to the greatest advantage, he injudiciously passed the Euphrates at Zeugma, and took his route across the great plains of Mesopotamia, where the Parthian cavalry, which was the main force of his enemy, would have every advantage of ground.

Orodes, the King of Parthia, sent his lieutenant or general, Surena, to oppose Crassus, while he himself made an inroad into Armenia, whose king, Artavasdes, was about taking the field in alliance with Crassus.[2] Surena had nothing but cavalry in his army. This was not the habitual custom of the Parthians, for their armies often contained four or five times as many infantry as cavalry, but as the king was entering upon a campaign in the mountains of Armenia, he naturally took the infantry with him, leaving the cavalry to his favourite general, who, if called upon to fight, would only be obliged to do so upon open plains, exactly suited to the use of that arm.[3]

Surena's army was composed of two kinds of horsemen—the heavy and the light. The heavy armed cavalry were clad almost entirely in mail armour, wearing cuirasses and thigh-pieces of leather with scales of brass or iron sewn over them, and helmets of polished iron. They carried no shield, their armour being a sufficient protection. They carried a large lance or spear, one much more formidable than those in use in most nations of the time, and far more than a match for the light weapon then carried by the Roman cavalry. They used also bows and arrows of unusual size, that would pierce any ordinary armour, and so swift was the flight of the arrow that it was not seen until it had struck. They

[1] Plutarch, Crassus. [2] Ibid. [3] Rawlinson, Parthia, 160.

carried in the girdle a short sword or knife for close combat.[1]

They were accustomed to charge in a close line at speed, relying mainly upon their lances and the force of the shock. Their horses were heavily armed with breast-pieces, and had pieces of the same species of leathern scale armour, as that used by their riders, their sides and flanks being protected in the same way.

The light cavalry, which was the most effective in action, was in strong contrast to the heavy, and it comprised the main portion of the mounted force.[2] They were magnificent riders, trained from the earliest youth, so that man and horse moved almost with the volition of one being. The horses were fleet and active, were managed by a headstall and single rein, and ridden with hardly any equipment. The rider was clad in a simple tunic and trousers, and his principal weapon was a bow of unusual length, and a quiver full of barbed arrows. These arrows could be driven with great force and with equal ease, either while stationary or while advancing or retreating, and on this account their tactics consisted in simply swarming about an enemy's column, never coming to close quarters, but continually plying it with barbed shafts; retreating, shooting when attacked; advancing, shooting when the enemy retired, and hovering around them if halted at bay, wearying and destroying them with a system of tactics they were unable to meet with success.[3] As this required immense quantities of arrows, they had large reserves carried with the baggage upon camels, so that in action they could be furnished with fresh supplies when they were short. The light horsemen seem to have carried a sword, and the customary knife at the belt.[4]

The number of cavalry under the command of Surena is not given by any of the ancient historians. Plutarch says, a "vast number." Velleius Paterculus says, "an immense force." Rawlinson refers to these authors in his History of Parthia, and mentions that the Parthians met Antony shortly after with 50,000 horse, which would lead to the natural inference that Crassus must have been opposed by probably 40,000 or 50,000 cavalry.[5]

After crossing the Euphrates, Crassus, who had reconnoitring parties of horse far in advance, soon received reports that, although not a man was to be seen, yet there were vestiges of large bodies of cavalry which seemed to be retreating before them. On the third or fourth day after

[1] Rawlinson, Parthia, 404. [2] Ibid. 161. [3] Plutarch, Crassus.
[4] Rawlinson, 405. [5] Ibid. 162, note.

crossing the river, while marching over a desert country, exposed to great heat and without water, the remains of one of his patrols or reconnoitring parties of horse came in with the information that they had been attacked by Parthian cavalry, that their comrades had been killed, and that they had made their escape with the greatest difficulty. They reported the enemy to be very numerous, and in the highest spirits. Crassus at once formed his army in battle array in one long line, the infantry in the centre, the cavalry upon the wings. He extended his line as much as possible, in order to prevent his army being surrounded, but afterwards, evidently feeling that no extent of front could prevent that difficulty, with so numerous a force of horsemen before him, he wisely altered his formation, and drew up his legions in close order.

Plutarch is rather obscure in his description of the order of battle adopted by Crassus. It seems most probable that his men were placed in three bodies of twenty-four cohorts each, twelve fronting each way, and back to back to each other, so that they would form a solid oblong. Between these three masses and upon the flanks were divided the cavalry and light troops. The younger Crassus, who had served with great distinction under Cæsar in Gaul, and who had joined his father for this campaign, commanded one wing; Cassius, who afterwards assassinated Cæsar, commanded the other. Crassus himself took up his position in the centre.

In this order they marched forward to the banks of the river Belik or Balissus, where the wearied soldiers were able to obtain water to quench their thirst, after the fatigues of a march over the heated desert. The officers advised Crassus to camp on the banks until morning, but Publius Crassus, with the natural impetuosity of a young cavalry officer, and incited by the eagerness of the horsemen whom he commanded, urged his father vehemently to move on at once to the attack. Crassus, influenced by his son, commanded his army to take some refreshment as they stood in their ranks, and hardly waiting till they had finished, he again resumed his march with increased haste.

Surena awaited him with a portion only of his light cavalry of the advanced guard being visible. His heavy horsemen were concealed behind them with coats and skins thrown over their brilliant armour, so that its glitter might not betray their presence. When the armies were within fighting distance the Parthian kettledrums broke out into their discordant clang, the steel-clad warriors uncovered their arms, and appeared like squadrons of fire, with the sun

gleaming upon their breastplates and upon their highly-polished helmets of steel.[1]

In front of them sat Surena upon his charger, tall, erect, and well made, surpassing in size and beauty all the men of Parthia. Though only thirty years of age he had won a great reputation in the field for distinguished bravery. Plutarch says that his almost womanly beauty did not promise such courage as he was possessed of. Like Murat, Dundee, and many other celebrated generals of cavalry, he must have been a great dandy, for he was splendidly dressed, his face painted, and his hair curled and parted in the middle.

At first he seems to have decided to open the attack by a charge of his heavy armed lancers, but probably when he saw the immense depth and solidity of the bristling masses of Roman infantry, and the firmness of their demeanour, he considered it wiser not to risk a general charge. His cavalry therefore wheeled outwards and surrounded the Romans. Crassus thereupon ordered his archers and light infantry to charge. They were met, however, by the mounted bowmen, who plied them with such showers of arrows, driven with such force and execution, that they were at once hurled back upon the main body. The Parthians then began to swarm around the Romans, and with their large bows they kept up a continual shower of arrows, which were launched with such power as to pierce shield, breastplate, or greaves, inflicting fearful wounds.

The Romans were now in a desperate condition. When they charged forward, their assailants retired, still keeping up without cessation the terrible shower of death-dealing shafts; when they fell back into their original line, the swarm of horsemen followed closely, and the pitiless rain of barbed arrows still pelted upon them. The only ray of hope before them was that in time the missiles would be all launched, and rest would then come. This hope soon failed them, for they saw those in the front who had exhausted their quivers, making way for others while they retired, and renewed their supply from the reserves carried upon camels in the rear.

Crassus, in his despair, at last gave his son permission to take a portion of the troops, and by a bold charge, endeavour to obtain some relief. Young Publius took with him the 1,000 Gallic cavalry that Cæsar had sent, and with 300 other cavalry, 500 archers, and eight cohorts of infantry, he charged boldly against the enemy, who immediately fled,

[1] Plutarch, Crassus.

partly because it was not their policy to fight at close quarters, and partly to draw the detachment away from the main body. The young Roman immediately followed in pursuit with all haste, thinking a victory was being gained, and in this manner was drawn a considerable distance from his father, and entirely out of sight of the main army. Then the Parthians turned at bay. They formed a line of their heavy cavalry in front to check a further advance, and surrounded the party with irregular horse. The Romans closed together and defended themselves as well as they could, but their position was worse than ever. The shower of arrows commenced again; the soldiers fell fast in their ranks, the arrows sticking in them as they rolled in agony in the sand. When Publius Crassus called upon them to attack the heavy armed cavalry, they showed him their hands nailed to their shields, their feet fastened to the ground, so that they could neither fight nor fly. He then led his cavalry to the charge, but his men with their light short javelins and scanty armour, could make no impression upon the heavily armed Parthians, whose spears were so much more formidable. The Gauls fought bravely, seized the barbarians' pikes, and dragged them from their horses upon the ground, where they could scarcely stir from the weight of their own armour. Some of them despairing of gaining any success by ordinary means, dismounted from their horses, and getting under those of the Parthians, stabbed them in the belly where the armour did not protect them, and so overturned both horse and rider, often being trodden to death themselves. They then endeavoured to retreat to the main body, but finding they could not do so, they took up a position on a hill, placed their horses in the middle, and assuming a circular formation, locked their shields together all around, hoping to save themselves in that way.

It was all in vain, however. The young general, badly wounded, was advised by some of his officers to endeavour to save himself by flight, they offering to accompany him. His answer was, "There was no death, however dreadful, the fear of which could make him leave so many brave men dying for his sake." He desired them to save themselves, and dismissed them, and then ordering his shield-bearer to kill him, he offered his side to him to strike the blow, and so died. The rest fell gallantly fighting; and of this detachment of about 6,000 picked soldiers, 500 only were taken prisoners, the remainder being left dead upon the field.

This disaster must have all occurred within two or three

hours, and soon Crassus saw the Parthians returning, with loud shouts and songs of victory, which increased his intense anxiety for the safety of his son, when all doubts were set at rest by their coming forward, bearing the head of the gallant young cavalry officer aloft upon a pike, and displaying it to the anxious and dispirited Romans. Again the legions were assailed with the same vigour. They still fought however in their ranks, sternly resisting and bravely enduring the showers of missiles, and the pike-thrusts of the mailed horsemen, unable however successfully to defend themselves, or to inflict loss upon their assailants. So in monotonous carnage the day wore away, and night brought temporary relief to the distressed army. The Parthians, according to their custom of going a long distance to bivouac, retired far from the Romans, and gave them an opportunity, which they at once seized, of retreating to the neighbouring town of Carhæ. From there they retreated the next night, but at daylight were again attacked by the Parthians, and were able, with some loss, to reach the protection of a hill, when Surena opened negotiations for a surrender. In the interview which took place, a struggle ensued, in which Crassus was killed. So ended the Roman invasion of Parthia in that year. Of the 40,000 who crossed the Euphrates, 20,000 were slain, and 10,000 made prisoners, barely one-fourth succeeding in effecting a retreat.

The history of war does not afford a more brilliant illustration of the great value of the cavalry service, nor any instance where so great a result was due solely to the unaided efforts of horsemen. It is remarkable how thoroughly the Parthians appreciated the true value and real use of the horse for military purposes, and how skilfully they utilised two great advantages in war, namely, superior speed in movement, and superior range of missile weapons. These two points, well understood, and ably handled, should always secure success

The Parthians by this war gained the respect of the Romans, for they were really the only check to the advance of the power of the Roman Empire towards the east. The disaster suffered by the army of Crassus created a great impression in Rome. Their writers from that time grudgingly admitted Parthia to be their only rival, and the second power in the world. In fact the tide of success for the time had turned, and the hordes of the Parthian cavalry carried the standard of their empire victoriously over Syria and Asia Minor, rolling back the Roman legions as far as the Egean Sea and the shores of the Hellespont, so that for a full year

Western Asia changed masters, and Parthia was the dominant power.[1]

Such were the extraordinary results of a few differences in tactics and weapons between the armies of two great empires. The Romans at once saw their weakness and immediately took steps to remedy it. Ventidius, an able general, who, in B.C. 38, first gave a check to the Parthian forces, seeing the necessity of meeting the arrows of the enemy with a missile weapon of equal if not greater range, had carefully provided himself with a numerous body of slingers, and by entrenching in high ground and by manœuvring skilfully upon leaving his lines, he succeeded in obtaining a victory, partly by the good services of his slingers who galled the Parthian cavalry severely, and partly by the chance of Pacorus, the king's son, who commanded the enemy, being killed at the crisis of the action.[2] This battle turned the scale again, and confined the authority of the Parthian monarch to the limits of his empire, and the Roman eagles once more held their sway from the Atlantic Ocean to the banks of the Euphrates.

This success was secured by the improvements in organisation, armament and tactics of the Roman generals. They met the Parthian loose array and missile weapons with increased cavalry and a large irregular force of slingers, and to give every advantage to this last arm they supplied them with leaden bullets instead of stone, in order to give an increased range to the projectile, and more force to the blow.[3]

When Antony afterwards invaded Parthia he had 10,000 Gallic and Spanish cavalry, 30,000 light armed troops and cavalry of his Asiatic allies, and Armenia was to furnish him with 6,000 horse besides infantry, so that he probably had from 30,000 to 35,000 cavalry, and his whole force consisted at the outset of about 113,000 men. Although he had this large army the expedition was a failure, one of his lieutenants, Statianus, with a detachment of his army, was surrounded and his whole force, 10,000 strong, was cut to pieces, and Antony, after suffering much loss, effected a disastrous retreat, being continually harassed by the hostile cavalry. He was only able to bring about 70,000 men out of the country.

After this period the Romans made four great expeditions against Parthia, of which that commanded by Avidius Cassius was the only one that was entirely successful. The Romans were able, as under Trajan and Severus, to march

[1] Rawlinson, Parthia, 189. [2] Rawlinson, 192. [3] Ibid. Parthia, 194.

steadily into the country, and even in some instances to capture the capital, but they could not hold it, and to retire after an occupation almost certainly brought on disaster.[1] Then the swarms of light horse clung to their retreating columns, cut off the stragglers, prevented them from getting provisions, and incessantly galled them with their arrows.

The Parthians did not use war-chariots nor elephants, their supplies and reserve stores of ammunition and provisions were always carried upon camels, which were used in large numbers for this purpose.

There was one point in their military system that was a serious weakness to them. They were always in the habit of drawing off at nightfall if engaged in a pursuit, and bivouacking at a considerable distance from the enemy, and were accustomed to abstain from all military operations during the night. They were obliged to do this in order to hobble or tether their horses and give them time to pasture, which of course could only be safely effected at a considerable distance from their opponents, as a long time would necessarily be required to secure their horses, equip them, and to form up armed ready for action.[2] This habit gave a retreating army an opportunity of marching in any direction at night and of gaining many advantages in that way. The Parthians never fortified their camps, so that the necessity for separating themselves from their enemy at night was all the greater.

In the foregoing pages some particulars have been given of the cavalry of all the important nations of antiquity, more especially of all those of which history has left us any clear account. The wild tribes who lived beyond the influence of Greek and Roman civilisation have not left any records by which their manners and customs have been handed down to us, but we may safely assume that the weapons and tactics of the more remote tribes would not vary much from those in use among the nations which bordered on the Roman Empire, and of whose system of fighting Roman historians have given us some details.

SECTION VIII.—TACTICS, OUTPOSTS, PATROLS, &c.

We have gone back into the mists of antiquity groping for the origin of the use of the horse in war, and we have seen that the first idea was simply the rapid conveyance of the warrior to the place of combat; then the use of the horse mounted for the same object—then the fighting from

[1] Rawlinson. [2] Ibid. Parthia.

the horse itself, and lastly the development of the idea of the charge and the use of the weight and speed of the horse as an element of force. We have seen the cavalry attain its zenith under Hannibal, when it performed the most important part in the actions of his age, reaching the perfection of cavalry tactics, and that for two hundred years after the mounted force held its high position. At Pharsalia the tide begins to turn, and infantry learns to hold its own against the horsemen.

In Parthia also the principle of uniting great range of projectiles with superior mobility reached its highest development, and effected marvellous results for a long period. This system has never in the world's history been better understood, and more effectively put into practice, than by the Parthians about the time of the Christian era.

The use of cavalry for outposts, patrols, and reconnoitring parties was at this period thoroughly understood, and was based upon the same principles as those in use in modern times. The story of Alexander, King of Macedon, riding up to the outposts of the Greek army shortly before the battle of Platea, and asking to see Aristides the Athenian general, reads almost as if it had happened yesterday, for the sentries would not let him through their lines, but detained him while some were sent back with his message to the general, and to obtain orders what to do, and the conference took place at the outposts.[1]

Crassus had reconnoitring parties of horse in his front and considerably advanced. Cyrus the Great posted advanced guards and outposts beyond and around his camp, and also sent small patrols of five or ten in number continually and quietly to make the circuit of the camp during the night, as a guard against the approach of an enemy.[2] On the march also he used explorers or scouts who went in advance of his cavalry, which always marched before the main army.[3]

Hannibal had his patrols of Numidian cavalry and reconnoitring parties, continually swarming over the country in the neighbourhood of his army, nor do we read of his being ever surprised from the want of proper outposts.

The Romans understood the art of camping and entrenching their camps better than any other nation, and their system of outposts and patrols was equally good. They always had a guard before the gates of the camp, especially on the side facing the enemy.[4] There were also inlying

[1] Herodotus, ix. 44. [2] Xenophon, Cyropædia, iii. 3, 28. Ibid. iv. 5, 5.
[3] Ibid. vi. 3, 2, 6. [4] Guischardt, i. 146, 147

pickets inside of it, in readiness to sustain the guards, but in addition to these precautions outposts composed of both infantry and cavalry were placed well in advance to guard the avenues to the camp, and to sustain the patrols and reconnoitring parties.

The cavalry alone furnished the most advanced posts, and they formed a chain of videttes and smaller posts. Their outpost system was so perfect that Roman generals were rarely or never surprised, and never except by neglecting their usual precautions.[5] The most exact vigilance was required of the advanced troops and videttes, the least fault was severely punished, and the soldier who left his post was put to death without pity.

SECTION IX.—CAVALRY UNDER THE EMPERORS.

In the earlier times of the Republic it will be remembered that the armies were composed of those citizens who had a country to love, property to defend and an interest in maintaining laws which they themselves enacted. In time, as the dominion of Rome became extended and immense numbers of allied troops were brought to her standard, the army was soon composed mainly of mercenaries, instead of being the armed citizens of a free state, whose social and civil institutions were based upon its military organisation.[2]

The cavalry, which was at first composed of the wealthiest and best families of the nation, in the time of the Empire consisted entirely of levies from the provinces and from the poorer classes in the community. The *equites*, no longer used as the cavalry force of the army, not numerous enough to be of any service as a separate corps, and of too distinguished a class to fight in the ranks, when war, degenerated from a patriotic duty, had become degraded into a trade, were generally engaged in the administration of justice and in the care of the revenue.[3] Numbers of them did still continue to adopt the profession of arms, but they were always employed on the staff of the generals, or were immediately given the command of a troop of horse or a cohort of foot.

The cavalry in the time of the early emperors carried the javelin, the long broadsword, and sometimes the lance and iron mace.[4] Their defensive armour consisted of a helmet, a shield, light boots, and a coat of mail. They were divided into regiments of 726 horse, composed of nine troops of 66 men each and one of 132 men, which was in connection

[1] Guischardt, ii. 181, 182. [2] Gibbon, i. 10. [3] Ibid. i. 16. [4] Ibid. 17.

with the first cohort. They were naturally connected somewhat with the legion, but were usually placed upon the wings, or in the line of battle, or in reserve.

The overgrowth and wealth of the Roman Empire, the luxury and extravagance which naturally crept into the manners of the people, in time sapped the strength of the state, and were soon seen to have their effect upon the army. The patriotism, the national sentiment that in early times distinguished Rome beyond all nations, gradually died out. The loyal courage of the citizens when every man was a soldier, when none could aspire to high office who had not served his term in the ranks, was soon lost when Rome, the centre of a vast empire, became far removed from the dangers and hardships of war.

From the appearance of Hannibal before the walls of Rome in 211 B.C., until Alaric encamped before it with his army of Goths in 408 A.D., a period of six hundred and nineteen years elapsed, in which the seat of empire was never once insulted by the presence of a hostile army.[1]

The Roman infantry, which when it conquered the world was but an armed people, soon became filled also with barbarian mercenaries, and with the most worthless classes in the community, who were attracted by high pay to serve in the ranks, while the better class of the citizens and those of wealth and distinction idled away their lives in the enjoyment of the effeminate and extravagant luxury of an overgrown capital.

Such was the aversion among the degenerate Romans to the profession of arms that the youth of Italy in many instances cut off the fingers of the right hand to escape military service.[2] This practice was so common as to render necessary special laws forbidding it, and fixing the punishment in case of transgression.

The mercenary troops, who under the Empire alone composed the armies, soon wrested from their weak and luxurious masters concession after concession. They soon felt their power and appointed emperors of their own choice, and the emperors well knew that they only held the throne by the consent of their soldiers. The effect of this upon the discipline of the army was very injurious, and was speedily and severely felt.

Septimius Severus being declared emperor by the Pannonian legions, and securing that position through the exertions and good will of the military forces, thought it his policy about the year 193 to commence the evil practice of

[1] Gibbon, iii. 244. [2] Ibid. iii. 130.

relaxing discipline in the army.[1] He increased their pay beyond what it had ever been previously; he instituted the custom of giving them donations on occasions of public festivity, and allowed them to live idly in their quarters. The officers were allowed to set an example of luxury, and the general tendency was soon seen in the enervation of the troops, in their incapacity to endure the hardships of military life, and in their growing impatience of a proper subordination.

Caracalla carried out the principle of pandering to the legions to a much greater extent, the state being exhausted to enrich a useless and insubordinate soldiery.[2] The Emperor Alexander Severus saw the ruinous laxity that had crept into the army, and was very anxious to restore to it some semblance of that discipline which had done so much to build up the Empire. So bad, however, was the state of affairs, that even he was obliged to pay them very highly, to relax the old rule by which each soldier on the march carried seventeen days' provisions on his shoulders, and to form numerous trains of mules and camels to wait upon their haughty laziness.[3] He found it impossible to put a stop to their luxury, and therefore ingeniously tried to guide it usefully into a love for good arms, fine trappings, well-bred horses, and shields ornamented with gold and silver.

The laziness and degeneracy of these troops was next shown in their unwillingness to bear the weight of defensive armour. Vegetius, who is supposed to have written under Valentinian II. in the latter part of the fourth century, gives a most melancholy picture of the evils existing in his day, in reference to the arms of the legionaries.

He says that, from the foundation of Rome until the time of the Emperor Gratian, the Roman infantry had always worn the casque and the cuirass, but that when sloth and negligence had rendered the exercises less frequent, the soldiers carrying them only rarely, soon found them too heavy to wear, and demanded of the Emperor, first to be relieved of the cuirass, and then of the helmet. As the Romans abandoned the armour they had carried victoriously all over the world, the barbarians began to adopt it, and the cavalry of the Goths, Huns, and Alani were clad in defensive armour. The Roman infantry soon found themselves opposed with their heads and bodies defenceless against the Goths, who destroyed them by the multitude of their archers. In spite of many defeats, and the ruin of splendid cities, no general

[1] Gibbon, i. 146. [2] Ibid. 161. [3] Ibid. 180.

dared to compel his soldiers to resume the use of heavy armour. The result was that the soldier thought more of flight than of fighting. Vegetius makes an eloquent appeal in favour of the restoration of armour.[1] "Those who find the old arms so burdensome," he says, "must either receive wounds upon their naked bodies and die, or what is worse still, run the risk of being made prisoners, or of betraying their country by flight. Thus, to avoid fatigue, they allow themselves to be butchered shamefully, like cattle."

One can hardly imagine that the above description refers to the successors of the splendid infantry that fought at the Trebbia, and which in a thousand years of victory had won so high a reputation. The legions which had maintained the dignity of the Roman name along the immense frontiers of the Empire, retained their military qualities long after the seeds of decay had been destroying the life of the state at its heart. They soon however became corrupted by the laxity of the emperors, and soon deserved such a character as that given them by Vegetius. The barbarians were not long in discovering their weakness, and lost no time in taking advantage of it.

The Romans, in the mean time, relying on the great distance of the frontier from the home provinces, fondly believed themselves secure from barbarian invasion. The delusion was rudely dispelled by an irruption of the Goths, in the reign of Philip, about the year 248, which awakened them to their danger. The Roman troops, composed of cowardly mercenaries, betrayed the most important posts, and took service under the standard of the invader from fear of the punishment due to their treachery. The inhabitants of the Roman province of Mœsia ransomed their lives and property by the payment of a large sum of money.[2]

A year or two later, the Goths attacked the same province again, and the Roman army was destroyed, and the Emperor Decius killed; and from this time the great power, whose troops for so many years had been so uniformly victorious, was continually suffering defeats and losses, and was learning year by year to place less reliance upon the infantry legions.[3] The decline of the Roman infantry gave the barbarian horsemen, who swarmed around the frontiers, frequent opportunities to gain successes, and in time gave to the cavalry service a somewhat fictitious reputation, and led the Romans to believe that their defeats were to be attributed more to the superiority of the cavalry service as an arm, than to the insubordination and degeneracy of their own troops.

[1] Vegetius, i. c. 20. [2] Gibbon, i. 290. [3] Ibid. 291.

This idea gaining ground, the Romans naturally turned their attention more to the cavalry, increased that force considerably, and relied much upon it to maintain their position in the field.

By the year 312 the cavalry force had much increased. In the battle fought in that year near Turin, between Constantine and the generals of Maxentius, the principal strength of the army of the latter consisted in its heavy cavalry. The horses of this force, as well as the men, were clothed in complete armour, well fitting and adapted to the motions of their bodies.[1] They were very heavy, and in the direct charge were almost irresistible. They sometimes, as they did in this battle, charged in a mass of wedge shape, the point directed towards the enemy. They must, however, have been unwieldy and unmanageable, for Constantine, by skilful evolutions and manœuvres, succeeded in dividing the heavy body of horsemen, and by his superior tactical skill gained a decisive victory.

This species of heavy armed cavalry seems to have been copied from those in use by the nations of the East. In 351 Constantius, the son of Constantine, won a signal victory over Magnentius at the battle of Mursa by the use of his cavalry,[2] which were heavy armed cuirassiers, glittering in scaly armour, and who with ponderous lances broke the firm array of the Gallic legions by the impetuosity of their charge. From the time of Constantine the cavalry composed the principal part of the Roman armies, and in the reign of Justinian the Byzantine army in the field consisted almost entirely of heavy armed cavalry. The barbarians being then almost all horsemen, had placed the cavalry service in high honour. The most important portion of the army of Belisarius in this reign was his body of mounted guards, who were picked soldiers, chosen for their strength, courage, and skill, as well as for the good quality of their horses and armour. The infantry occupied a very secondary position in his army, the cavalry being almost entirely relied upon. Many of them were armed with the Scythian bow. Procopius defends the use of the archers,[3] which some critics of his time had been inclined to despise :—

"Such contempt might, perhaps, be due to the naked youths who appeared on foot in the fields of Troy, and lurking behind a tombstone, or the shield of a friend, drew the bowstring to their breast and dismissed a feeble and lifeless arrow. But our archers (says the historian) are mounted on horses, which they manage with admirable skill. Their

[1] Gibbon, i. 477. [2] Ibid. ii. 195. [3] Ibid. iv. 120.

head and shoulders are protected by a casque or buckler, they wear greaves of iron on their legs, and their bodies are guarded by a coat of mail. On their right side hangs a quiver, a sword on their left, and their hand is accustomed to wield a lance or javelin in closer combat. Their bows are strong and weighty, they shoot in every possible direction, advancing, retreating, to the front, to the rear, or to either flank, and as they are taught to draw the bow-string not to the breast, but to the right ear, firm indeed must be the armour that can resist the rapid violence of their shaft."

The above extract gives a very good idea of the armament and equipment of the cavalry of that age, and it is remarkable how closely the Romans had imitated those Parthian archers, whose tactics had cost them so dear in so many campaigns.

The great increase of cavalry, the weight of their armour, and the quality of their horses, were all in vain to save the falling Empire. Arms, equipment, or tactics could do nothing to save a nation where the guiding principle was lost, where there was no longer a feeling of patriotism, where the national life was dying out, and where the indulgence of selfish luxury was the ruling sentiment of the people.

The barbarian tribes, hardy and warlike, fighting chiefly on horseback, soon flooded over the provinces, gathering immense booty in the wealthy and civilised countries of Southern Europe; and at last, in the year 410, eleven hundred and sixty-three years after the foundation of Rome, the Goths, under Alaric, captured the imperial city, and the mistress of the world was handed over to the licentious fury of the fierce tribes of barbarians.[1]

A few years later, the great barbarian ruler, Attila, king of the Huns, threatened the Roman Empire, and compelled it to make treaties most humiliating in their terms. He united Germany and Scythia under his rule. His army was of enormous strength,[2] containing 500,000 men of various nations that acknowleged him as king. The Huns, who formed a considerable part of his army, are well described by Ammianus Marcellinus, and we learn from him that they never lived in fixed habitations, but wandered about on horseback, followed by cattle drawing cars on which their women and children lived. They were inured to all hardships, and were clad in dresses made of skins. They rode small horses, ugly but vigorous, and swift in their paces, and they seem to have almost lived in the saddle, buying and selling, eating and drinking mounted, and sometimes even sleeping resting upon the necks of their horses.[3] They charged in battle without

[1] Gibbon, iii. 282. [2] Jornandes, ch. 35. [3] Ammianus Marcellinus, xxxi. 2.

order, in separate bands under different chiefs, and fell upon their opponents with loud shouts. In case of solid resistance, they retreated, scattering to rally and charge again at the first opportunity. They knew nothing of fighting on foot, or of the art of defending or attacking fortifications. They used the bow with wonderful skill, their arrows being pointed with bone instead of iron, and having a very extended range. For close quarters they used a snare or net, to entangle their enemy, while they destroyed him with the blows of the sword which they carried. Besides the Huns, Attila had also in his army many other nations, some of whom wore cuirasses of horn mail, and carried enormous lances.[1] There were contingents from all parts of Germany and Scythia. At the head of this horde Attila invaded Gaul in 451, and besieged Orleans. On the approach of the Roman General Ætius, with his allies, Theodoric, king of the Visigoths, and Sangipan, king of the Alans, Attila raised the siege, and retreated to the fields of Catalaun, and in the neighbourhood of Chalons was fought one of the greatest battles in the world's history.

Attila commanded the centre of his army, where were placed his best troops. His right wing was commanded by Ardaric, king of the Gepidæ, his left by the kings of the Ostrogoths. Ætius commanded the right wing of the allied forces, King Theodoric the left, while Sangipan, king of the Alans, whose fidelity was suspected, was placed in the front line in the centre.

A height which occupied an advantageous position between the two armies had been taken possession of by Thorismond, King Theodoric's son, with some Visigoth cavalry. This gave Ætius a great advantage. Attila, seeing the importance of the post, sent some squadrons to occupy it. Thorismond, having reached the summit, charged the Huns with vigour, and drove them off without difficulty. Attila then made a furious attack upon this portion of the Roman line, and supported it by some of his best troops, which were detached from the centre for the purpose. The Romans having the advantage of the ground, maintained their line and repulsed the enemy. Theodoric, the gallant old king of the Visigoths, led a splendid attack with the left wing against the Ostrogoths on Attila's right.[2] The charge was vigorous in the extreme; the aged monarch, struck down by a javelin as he charged at the head of his men, was trampled to death by the rush of his advancing squadrons, who swept all before them, and then, wheeling to the right, fell full upon the flank of the Hunnish

[1] Thierry, i. 133. [2] Jornandes, xl.

centre, which was closely engaged with the Alans. Defeated upon his two wings, and with his centre outflanked, Attila retired to the shelter of his camp, where his archers dismounted, and protected by the barrier of waggons, soon checked with their arrows the advance of the pursuing horsemen.

Attila remained sullenly in his camp the next day, expecting an attack, and prepared for a desperate resistance. The plain was covered with dead and dying, the carnage on both sides having been fearful; and the victorious allies, impressed with the resolute attitude of their enemy, deemed it prudent to avoid an attack, and allowed him to retire without molestation.

This victory was won by cavalry, and although the records of it are very obscure, we can trace in the plans of Ætius a resemblance to the tactics of Scipio at Iling. Ætius, like Scipio, had a large contingent of allies that he could not trust, and he adopted the same policy of placing them in the centre, while with his best troops he attacked the two wings of his opponent's army. Attila, like Asdrubal, placed his best troops in the centre, and when the flanks were defeated, these soldiers covered the retreat, saved the remains of the army, and prevented a check becoming a disaster. This victory is interesting as the last one ever gained by imperial Rome.

We have now traced the history of cavalry from the earliest times down to the period when the Roman Empire is falling to pieces, when the ancient civilisation is destroyed, and when the tumults and confusion caused by such a general upheaval, and the consequent destruction of art, science, and literature, are gradually producing the dark ages. We will leave the question we are discussing at this point, where history seems almost lost in a mist, and in the next portion of the work begin groping again to pick up on this side of that period the threads of the tangled skein which we now drop.

PERIOD II

FROM THE FALL OF THE WESTERN ROMAN EMPIRE TO THE INVENTION OF FIRE-ARMS

CHAPTER IV.

FEUDAL CAVALRY.

SECTION I.—ORIGIN OF FEUDAL SYSTEM.—BATTLE OF POICTIERS, 732.

IN the last period the history of cavalry was brought down to the time when the Roman Dominion of the West had fallen to pieces, and it will be well to consider now the condition and growth of the cavalry service in the various nationalities that arose upon the ruins, and were formed of the disjointed fragments of the shattered Empire.

After the conquest of Rome by the various German tribes, the habits and customs of the German people naturally exercised a most important influence upon the civilisation of the age, and for many centuries the effect can be traced in the development of a different type of government, both in a civil and military point of view, from that which had existed under the Romans.

One important institution of German origin, namely, the "Feudal System," which soon became established, rapidly spread all over Europe, and has more or less affected the tenure of land to the present day. This institution, being for many generations the basis of the military systems of the nations of Europe, merits some consideration.

It is certain that long before the invasion of the Roman Empire, there existed among the Germans certain noble or privileged classes or families. This is established by Tacitus, who draws the distinction between the "nobiles," or "prin-

cipes," and the plebeian orders. Aristocratic families, from which the chieftains of the tribes were elected, are also alluded to continually in historical works.

At first the German tribes, wandering in vast tracts of forests, living mainly by the chase, and continually engaged in war with neighbouring nations, did not value property in land, which was then held in common. At this period the young warriors were accustomed to band themselves into military fellowships or companies, and to elect one of their number as leader or general. This was done by raising upon a shield him who among them was believed to possess in the highest degree the courage and military skill required by a commander.[1] Sometimes a chief, already famous, and enjoying an exalted reputation, would gather around him an army of young men attracted by his fame, who would enrol under his banner, and grant him implicit obedience. These parties would migrate, and invade other countries in search of land to settle upon. The Suevi divided their nation into tens, hundreds, and thousands, and the land was held in common by the different districts or cantons. They also sent out large parties, annually, to migrate in search of new fields, as bees swarm when the hive becomes overcrowded.

These hordes, whenever victorious, settled in the new territory, and divided the land equally among the free-born warriors. These grants were hereditary, and were termed Allods, from *Od*, an estate; their boundaries were carefully marked,—and each owner dwelt within the limits of his own estate.[2] An Allod could not be sold without the consent of the family, nor could the government confiscate it for any wrong-doing of a present proprietor, who held it, and the freedom it gave him, as an inalienable right.

These free-born allodial proprietors, and their slaves captured in war and compelled to serve them, were the only two classes among the early Germans;[3] it being supposed that the so-called nobles or principes were simply the eldest sons and heirs to the estates, which gave them a rank higher than that of their younger brothers. In time some of the slaves became manumitted, and portions of land were furnished them by their masters upon certain conditions of service, and the payment of a yearly tribute. Sometimes in conquering a country they left a portion of the land in the hands of the original inhabitants, stipulating that they should perform certain services in return.[4] This produced a class not slaves nor yet free, but merely dependent as vassals to the feudal lord. Their property in the land, subject to the

[1] Menzel, Part i. sec. ix. [2] Ibid. xiii. [3] Ibid. xiv. [4] Boutaric, 103.

duties to be performed, was fixed and well understood, but was called "Fe-od" or "Fief" (which means transferable property), in contradistinction to Allod or freehold. This was the foundation of the feudal system.

Soon the principal chief or king became an hereditary officer, and extensive kingdoms were established which retained much of the ancient Germanic constitution. After the establishment of the monarchical government[1] the royal allotment of conquered land was much greater than that of any of the free-born warriors, and consisted of a large domain where the king held his court, as well as other allods in various parts of the country. These extra grants were made to support him and his court, so as to prevent the necessity of direct taxation.

The division of the allodial proprietors in these kingdoms was, in imitation of ancient customs, made by tens and hundreds. The smaller division soon disappeared, and the hundreds became cantons, several of which formed a Gau or province.[2] The hundreds, into which England was parcelled about 1,400 years ago by the Anglo-Saxons, a German tribe, are in existence to this day as a recognised territorial division. The judges or presidents, who were formerly elected over each province by the popular vote of the assembly, were under the monarchy appointed by the king. The chief officer of the province was known by the title of Graf or Count (*comes*), and he commanded the contingent furnished by the Gau in time of war. When the kingdoms increased largely, including subdued nations, these latter were sometimes allowed to retain their former rulers, on condition of furnishing contingents in the field. This gave rise to the ducal dignity.

The state was thus divided into dukedoms, provinces, and hundreds. The army consisted of the whole nation, and was commanded by the chief men of the hundreds, by the Grafs or chiefs of provinces, by the Dukes, and over all by the king.[3] The army was a militia pure and simple, and there was no standing force. When the nation was summoned for an assembly to discuss affairs of state in time of peace, it was called the Arimannia, from *mannire*, to cite. When brought out for war it was called the arrière-ban, or *Heerbann* (from *Heer*, an army, and *bannire*, to summon). The orders proceeded from the monarch to the dukes, from them to the counts, from them to the centners or chiefs of hundreds, who communicated them to those under them. Each man followed to the wars the same chief who governed him in time of peace.

[1] Menzel, Part i, sec. lxxiv. [2] Ibid. lxxv. [3] Ibid.

The discipline was well maintained, and the punishment for offences severe.

The allodial freemen had many privileges. They were exempt from taxation and from the compulsory labour which was required of tributary subjects. They assisted in the proceedings of justice, and had their share of legislative authority in the general assembly of the people.[1] They had the liberty of carrying arms and using them to avenge injuries, and they paid no permanent ground rent as did the subjected Romans who held lands. In return for all these advantages, the free landholder was compelled to serve in the *Heerbann*, during which service he had an undisputed right to his share of the general plunder. He had also to furnish horses and waggons in time of war, and in case of need was expected to give presents and supplies to the king and his court.

Any freeman who neglected to attend the summons to join the army lost his privileges, but sometimes a fine would be accepted in lieu of personal military service. Among the Anglo-Saxons, the kings confiscated the allodial lands of those who deserted, and conferred them upon the counts of the provinces. A large portion of these freemen, in war time, served in the infantry forces, the higher classes among them and the wealthiest alone fighting as cavalry.[2] The increase in cavalry and the improvement of that force tended greatly to change the allodial into the feudal system.

When the migrations had ceased and the monarchs became settled in their kingdoms the feudal system became perfected, particularly in France, where the kings divided the lands they had gained as fiefs among their friends and confidants (*fideles* or *antrustiones*), who, being usually high officers of the court, held a higher position in the general assembly than the ordinary allodial proprietors. The king gave privileges to his feudatories from time to time, until they were at length formed into a class of nobles, who outranked the ancient nobility who were simply freemen.[3] The advantages of holding royal fiefs became so great, that many allodial proprietors surrendered their estates to the monarch, and swore allegiance to him as their feudal lord, upon receiving back their lands in fee. Thus the feudal system increased until almost all the land was held in fee from the monarch.

The holders of large fiefs soon adopted the plan of increasing their power and influence by letting, either to other noblemen, or to freemen, large portions of their estates, which these latter held as their vassals. This process was called

[1] Löwy, 4, 5. [2] Ibid. 11. [3] Menzel, Part i. sec. lxxvii.

sub-infeudation, and soon became very general, so that almost all fees were of this type.

About the time of Charlemagne (800 A.D.) horsemen in armour began to decide the fate of battles. The Germans had copied from the Romans the use of armour, and had gained many advantages over their opponents by so doing. The Franks under Clovis had also adopted this species of defence, and in the battle against the Visigoths the king himself owed his life to his armour.

The service in the cavalry was connected with the possession of benefices or fiefs in the days of Charlemagne, when that force formed a very important portion of the army. The horsemen were separately mentioned when summoning the troops into the field.[1] As no regular pay was given to the soldier, the fiefs were intended to provide the funds for supplying a mounted knight with the necessary attendants, horses, and equipment, the cost of which was very heavy and beyond the means of the ordinary freeman

The cavalry was consequently entirely composed of nobles, who formed the chief force of the nation. To such an extent was this the case,[2] that the term *miles*, a soldier, became limited in its meaning, and during the eleventh century signified only a noble horseman, or knight, and was never applied to any of the inferior grades in the army. The terms chevalier, caballarius, caballero, originally meaning a horseman, also came to be considered as titles of nobility.

In Spain every citizen who possessed a sufficient amount of property was bound to serve the king in war as a horseman (*caballero*), and in return for this service he was entitled to the same rights and privileges as the landed aristocracy.[3]

The feudal system was carried into England by William the Conqueror, and the greater portion of the country parcelled out among his followers in large fiefs. The privileges of the nobles were however much more restricted than in other countries, while the masses of the people were in the enjoyment of greater liberty. The military system was based upon the same principle as was in use in Europe, and the mounted knights who served under the king were the highest class in the state.

During the period that these changes were going on in the military and political systems of Europe, the records of the art of war, and the accounts preserved of the different important battles fought, are so obscure and so imperfect that but little can be said concerning them. It is almost certain however that even were we in possession of authentic details

[1] Löwy, 13. [2] Ibid. 14. [3] Ibid. 21.

upon the subject, we should find but little of value in connection with the military art. The decline of civilisation and the ascendancy of barbarism affected war as it did all other arts and sciences, and it is not likely that the barbarians were much acquainted with either discipline or tactics. Of the battles of Soissons and Tolbiac fought by Clovis we can say but little. We have fortunately some interesting particulars of the Battle of Casilinum fought in 554, where the Eunuch Narses won a most decisive victory over the Franks under Bucelinus by the tactical use of his cavalry.

Bucelinus had 30,000 effective infantry in his army, but no cavalry. Narses, who commanded the troops of the Emperor of the East, had only 18,000 men, of whom a large portion were cavalry in armour and using bows and arrows.[1] He drew up his forces in line, the heavy infantry in the centre, the cavalry upon the wings, the archers and slingers in the rear. As he was drawing out his army for battle,[2] he was told that one of the chiefs of the Heruli, which formed a large contingent of his command, had slain one of his own servants for some trivial offence. He at once inquired into the case, and executed the officer upon the spot. The Heruli, indignant at his severity, refused to go into action. Narses said if they did not, they would lose the honour of the victory, and proceeded without them—arranging that if they came up they could act as a second line or reserve.

Bucelinus formed his army into a wedge-like order, with the point towards the enemy, and charged vehemently against the centre of the Roman line, which was soon broken and obliged to give way. Narses was not discouraged, but swung forward his two wings of cavalry, who armed, some with bows and arrows, some with javelins, and some with lances, fell upon the flanks and rear of the Frankish infantry,[3] who were not protected either by helmet or cuirasses, and were armed only with sword, battle-axe, and buckler.[4]

The highly trained Roman archers who, clad in complete armour, harassed with their arrows the unwieldy mass of defenceless barbarians, soon threw them into confusion and checked their victorious charge. At this crisis, the Heruli under their leader Sindual, forgetting their revengeful feelings in the excitement of battle, charged impetuously the pointed head of the column which had pierced the Roman line of battle. This settled the fate of the day, and the barbarians, surrounded and defeated, were almost annihilated. The historian Agathias makes the almost incredible statement

[1] Gibbon, iv. 277.
[2] Daniel, Milice Française, i. 19, 20.
[3] Daniel, i. 20, 21.
[4] Gibbon. iv. 278, 279.

that only five Franks survived out of thirty thousand, while the Roman loss was only four score.

One of the most important and most interesting battles of the dark ages was that fought at Tours or Poictiers in the year 732, between Charles Martel and the Saracens under Abderrahman, for on that field was settled the fate of Christian Europe. The Saracen caliph crossed the Pyrenees at the head of an army, variously computed at from 80,000 to some hundreds of thousands. One monkish chronicler puts the loss of the Arabs at 375,000, which is evidently a gross exaggeration, but it is a proof that the numbers must have been very great. The accounts of the battle are incomplete and very deficient in military details.

The following account, taken from the Arabian chronicler, gives the best idea of the combat. After saying that there was war between the Count of the Frankish frontier and the Moslems, and how the Count raised an army and fought against them, the chronicler says:—

"But Abderrahman drove them back, and the men of Abderrahman were puffed up in spirit by their repeated successes, and they were full of trust in the valour and the practice in war of their Emir. So the Moslems smote their enemies and passed the river Garonne and laid waste the country and took captives without number, and that army went through all places like a desolating storm. Prosperity made these warriors insatiable. At the passage of the river Abderrahman overthrew the Count, and the Count retired into his stronghold, but the Moslems fought against it and entered it by force and slew the Count, for everything gave way to their cimeters, which were the robbers of lives. All the nations of the Franks trembled at that terrible army, and they betook them to their king Caldus (Charles Martel) and told him of the havoc made by the Moslem horsemen, and how they rode at will through all the land of Narbonne, Toulouse, and Bordeaux, and they told the king of the death of their Count. Then the king bade them be of good cheer, and offered to aid them. And in the 114th year (of the Hegira) he mounted his horse, and he took with him a host that could not be numbered, and went against the Moslems. And he came upon them at the great city of Tours; and Abderrahman and other prudent cavaliers saw the disorder of the Moslem troops, who were loaded with spoil, but they did not venture to displease the soldiers by ordering them to abandon everything except their arms and war-horses. And Abderrahman trusted in the valour of his soldiers, and in the good fortune which had everywhere attended him. But such

defect of discipline is always fatal to armies. So Abderrahman and his host attacked Tours to gain still more spoil, and they fought against it so fiercely that they stormed the city, almost before the eyes of the army that came to save it. And the cruelty and fury of the Moslems toward the inhabitants of the city were like the fury and cruelty of raging tigers." "It was manifest," adds the Arab, "that God's chastisement was sure to follow such excesses, and fortune thereupon turned her back upon the Moslems.

"Near the river Owar (Loire) the two great hosts of the two languages and the two creeds were set in array against each other. The hearts of Abderrahman, his captains, and his men, were filled with wrath and pride, and they were the first to begin the fight. The Moslem horsemen dashed fiercely and frequently forward against the battalions of the Franks, who resisted manfully, and many fell dead on either side until the going down of the sun. Night parted the two armies, but in the grey of the morning the Moslems returned to the battle. Their cavaliers had soon hewn their way into the centre of the Christian host. But many of the Moslems were fearful for the safety of the spoil which they had stored in their tents, and a false cry arose in their ranks, that some of the enemy were plundering the camp, whereupon several squadrons of the Moslem horsemen rode off to protect their tents. But it seemed as if they fled, and all the host was troubled. And while Abderrahman strove to check their tumult and to lead them back to battle, the warriors of the Franks came around him and he was pierced through with many spears, so that he died. Then all the host fled before the enemy and many died in their flight. This deadly defeat of the Moslems, and the loss of the great leader and good cavalier Abderrahman, took place in the hundred and fifteenth year."[1]

These extracts do not give a clear idea of the tactics of the opposing forces, but one can gather from them that the Saracens relied upon their cimeters, and consequently fought at close quarters, while the Franks used lances as well; for Abderrahman seems to have been killed by spear-thrusts. The Arabs say the battle lasted two days, the Christian chroniclers say six or seven days. This leads to the inference that the fighting must have consisted of desultory skirmishes of horsemen carried on all over the plain with varying success. With such unwieldy and undisciplined hordes it is very improbable that a pitched battle could be fought on an open plain, without one party or the other winning a decisive

[1] Creasy, Decisive Battles: Tours.

victory in one day. The death of Abderrahman, following the confusion caused by the report, true or false, of an attack upon the camp, was quite sufficient to turn the scale of victory in favour of the Franks, and the loss of the vanquished in the pursuit would make the result very decided.

"This victory of Charles Martel, followed by the successes of his son Pepin, expelled the Saracens from the boundaries of France, and Charlemagne, his grandson, put a final check to their progress in Western Europe by driving them out of part of Spain, and annexing the territory between the Pyrenees and the Ebro to his empire, under the name of the Spanish March."[1]

Some years subsequently, in the reign of Charles the Bald, the cavalry formed the principal portion of the army. In a battle fought between the king and Robert le Fort, who had command of the troops of the Duke of Brittany, the most important force on each side was the cavalry. Charles had a large body of Saxon horse, which had been sent to his assistance by his brother Louis of Germany. This corps he placed in front of his line to withstand the attacks of the Breton cavalry, who appear to have been very skilful horsemen. The late Dukes of Brittany had bestowed much attention upon their army, and had organised a mounted force somewhat similar to those of the ancient Parthians. They were armed with javelins, and were formed up in small bands, which rode up and manœuvred around the enemy, carefully avoiding the charge, throwing their javelins at a moderate distance, and retiring swiftly. If pursued, they threw their missiles while in flight with such skill as rarely to miss their aim. They soon dispersed the Saxons, and then used the same tactics against the infantry, who, armed with pikes and swords, which were of no use at a distance, were badly defeated by troops with whom they could not come to close quarters.[2]

Charlemagne was the greatest monarch of the dark ages, his empire consisting of France, part of Spain, nearly all Italy, Germany, and a portion of Hungary. From his death until the crusades, the world, so to speak, was occupied and disputed by the three great empires, or nations, of the Greeks, the Franks, and the Saracens.[3]

The defeat of Abderrahman, and the successes of Charlemagne, had virtually put a stop to the increase of the Saracen power in Spain, whither it had extended after sweeping along the whole southern boundary of the Mediterranean, from Arabia, through Egypt, Lybia, Mauritania, and across the Straits of Gibraltar, in the incredibly short period of about

[1] Gibbon, v. 49. [2] Rocquan, i. 214. [3] Gibbon, v. 364.

one century. From the east, however, the onward march of the Saracen, or Turkish conquest, was still advancing towards Germany, and the conflicts and battles connected therewith form a link in the history of the cavalry service of much interest to the military student.

SECTION II.—CAVALRY OF THE TURKS, FRANKS, AND GREEKS, IN THE TENTH CENTURY.—BATTLES OF MERSEBURG AND AUGSBURG.

The Turkish and Saracen cavalry were most effective light horsemen. They rode with wonderful skill, and managed their horses, which were noted for their admirable spirit and swiftness, with great dexterity. They were proficient in all the evolutions of irregular warfare, and were continually practising on horseback and in the field the use of the bow, the javelin, and the cimeter. The lance seems to have been slung behind the shoulder while the horseman was using the bow, and when occasion offered it was taken in hand for close fighting.

The best horses were sometimes protected on the breast, by armour of iron or hide, while the horsemen themselves wore cuirasses. They did not encamp in regular entrenchments, but covered their bivouac or tents by a thick cordon of posts and sentries, thrown forward to a great distance, which made it very difficult to surprise them.

Their armies were organised in a number of large troops or bands, who formed up with small intervals. Their system of fighting was very irregular, and consisted of charging up and falling back if firmly met, being always on the alert to dash in whenever an opening occurred, or any confusion showed itself in the ranks of their opponents. If they were successful in a charge, they followed the fugitives most mercilessly, plying their sharp cimeters with deadly effect.[1]

The Saracens proper, of Arabian origin, in their military customs were very similar to the Turks. They fought principally as cavalry, the infantry of their armies being composed of Ethiopians, who were armed with large bows. Their cavalry were somewhat more heavily armed than the Turkish, as they wore casques, cuirasses, boots, gauntlets, and other defences, which had been in use among the Romans. They were much given to embellishing their girdles, and the bits of their horses, with silver ornaments.

They fought more steadily than the Turks or Huns, and used the lance, the sword, the battle-axe, and the bow.

[1] Leon, Institutes, 18.

Sometimes, in hurried marches, they took up their infantry "*en croupe*" for short distances. They protected their camps with defences, and posted numerous guards during the night.

They formed their order of battle in an oblong or square, and awaited the attack. After the first shock they fought at close quarters with great vigour. Their marches were often made in a hollow square formation, so that at once upon attack they could assume their usual line of battle.

The Turks were very averse to come to close quarters with a steady infantry that directed its attention to killing their horses; nor did they willingly face well-drilled cavalry in a level plain, if the cavalry were compact and in good order. The Arabs were not accustomed to fight on foot, and when they attempted it generally suffered heavy losses.

At this epoch the Franks, by which term the inhabitants of Western Europe are included, were a brave and hardy race of soldiers. Their infantry and cavalry were both accustomed to fight hand in hand. Their cavalry were armed with bucklers, lances, and very long swords, suspended to shoulder-belts, although some wore them on waist-belts. They formed for action by tribes and families, and not in turmæ, as had been the custom among the Romans. Sometimes they were banded together in companies or confraternities, although by this time the feudal system of ranging the troops under their grafs, or counts, must have been coming into use. In the age just preceding the institution of knighthood, the Franks were rude and unskilful in their use of cavalry, and the horsemen often dismounted and fought on foot.

Whether fighting on foot or mounted, they rushed upon the enemy with vehemence, and relied for success mainly upon the impetuous charge, followed by honest hand-to-hand fighting. The discipline among them was not very good, as can be readily imagined in an army composed of nobles and freemen who still looked upon their king as holding office simply by the voice of the people.[1] They turned out for war willingly, but were impatient of protracted campaigns, and abandoned their standards and returned home if the war was prolonged. Their cavalry charged rapidly with the lance in serried order, and required level plains to operate upon with advantage. They do not appear to have used reserves.

The Emperor Leon gives many details as to their habits, and advises his troops, in case of campaigning against them, to avoid fighting them in pitched battles, but to harass them on difficult ground, to entice them into ambushes, to attack their camps at night with mounted archers, and to prolong

[1] Gibbon, iv. 373.

the war in every possible way, in order to weary out their patience, and compel them to consume their provisions.

The Greek army at this period is fully described by the Emperor Leon, and we are enabled to discover, with some certainty, the state of the cavalry of the Eastern Empire during his reign.

The mounted archers wore coats of mail covering the body, and a helmet of polished iron, adorned with a crest. Their principal arm was the bow, of moderate strength, which was carried in a case to preserve it in good order, while they also were provided with a quiver containing thirty or forty arrows, a lance of medium size, with a pennon attached, a sword on a shoulder-belt, and a poignard in the girdle. Each man was also provided with a file, an awl, and a reserve of bow-strings.

The young horsemen, who were not skilled in the use of the bow, used the large buckler and two javelins. They wore gauntlets of iron, and used ornamented housings for their chargers. The horses, particularly those of the officers, had breastplates, and frontlets of iron or of felt. Neck-pieces and side-pieces were placed upon the chargers of those who fought in the front ranks, so that they were almost covered with armour. The bits were suitable and strong. The saddles, which by this time were generally in use, were roomy in the seat, had two stirrups, a valise, and a saddle-bag, in which could be carried three or four days' provisions. Shoes of iron were in use also in this age, fastened by nails to the hoof. The horse-trappings were ornamented with a tuft or plume upon the head, several on the saddle-cloth, as well as one hanging under the horse's jaw. Attached to the saddle was a sheath containing a battle-axe, with a blade on one side and a point on the other.

The soldier was provided with a great-coat or cloak, made loose and easy, and intended to be worn as the modern cloak over the arms and armour, so as to protect the wearer in bad weather, and to preserve his cuirass, his bow, and his other trappings from injury from the rain. They were used on vidette duty, and while engaged as scouts, partly for warmth, and partly to hide the glitter of the arms, from betraying their presence from afar.

The cavalry were formed up only four deep, because they had discovered that the surplus was useless, for among horsemen the rear ranks cannot press forward and support those in front, as can be done among infantry in the phalanx formation, and the rear ranks, whether archers or lancers, could not give much aid to those in the front.

In action the pennons were taken off the lances, as they were likely to be in the way, and were placed in cases. Small parties of cavalry were sent out from each turma in advance of the main body to reconnoitre the ground, and warn their comrades of any ambush or snare, into which the enemy might be endeavouring to lead them.

The cavalry were usually drawn up on the right and left of the infantry, the best troops being placed on the outside flanks. They were trained not to follow too impetuously the enemy's horse if they succeeded in putting them to flight, but to keep well in hand, for fear of falling into an ambush, or of becoming separated from their own infantry. They never dismounted to fight on foot, except in cases of great emergency. The ordinary disposition for battle was in two lines and a reserve. In case of a repulse the first line fell back upon the second. They trusted very much to the bow, and it was felt to be a public misfortune that archery was falling into desuetude.[1] The Emperor Leon advises and commands the military youth of his empire to practise the exercise of the bow assiduously, and to continue doing so until reaching the age of forty years.

Such was the state of the cavalry service in these nations when first the Hungarians or Turks (as they were called by the Greek historians) began to loom up in the East, and to threaten with conquest and destruction the people of Germany and Western Europe. Their military force, to which we have already referred, was very numerous, and was divided with their allies into seven equal corps or divisions, each of which consisted of about 39,000 warriors. Seven hereditary chiefs, or *voiêvodes*, commanded these bodies, and formed a council over which a supreme ruler was elected to command.[2]

They marched accompanied by women and children, and by immense numbers of cattle and sheep, which fed upon the plains over which they wandered. This made it necessary for their light cavalry to occupy the country, and to patrol to a very great distance from the main body. This moving population had gradually swept through Scythia, until they had approached the limits of the Byzantine and Frankish Empires, and had invaded the latter in Bavaria, where in the battle of Augsburg the Parthian tactics of the Turkish cavalry, in attacking and retreating, confused and bewildered the Christians, who for a while were victorious, and caused them to suffer a thorough defeat.

Their wandering armies of light cavalry spread over Germany with great rapidity, a circuit of fifty miles being some-

[1] Gibbon, v. 68. [2] Ibid. 412.

times ravaged in one single day. They were seen at Bremen, Pavia was burned by them, they penetrated even beyond the Pyrenees, and although the churches of Italy added the pitiful appeal to the litany, "O save and deliver us from the arrows of the Hungarians," their victorious career was only stopped by the waters of the Straits of Messina, and the lives of the people only saved by the payment of a composition per head. For thirty years the Germanic Empire or kingdom was subject to tribute to these warlike horsemen. Such was the speed and daring of these invaders, that light troops of three or four hundred cavalry would make the most daring raids, as far as the very gates of Thessalonica or Constantinople.[1]

Such was the melancholy state of Europe at the beginning of the tenth century, when all Christendom was at the mercy of predatory bands of light horsemen, whose tactics and morale had given them the ascendency. It was at this crisis that there came upon the stage one of those great military reformers, who by improvements in the tactics, armament, or method of fighting of the people, change the whole course of history, and build up or destroy nationalities by a few successful battles.

Henry I., surnamed the "Fowler," a Saxon prince, who was elected Emperor of Germany in 919, was destined to check the progress of the Hungarians, and to deliver the empire from their yoke. He saw that the sole difficulty was the want of an efficient military organisation, and that it would require time to complete it. He therefore took the first opportunity to buy a peace or truce for nine years, by the payment of a yearly tribute, and then bestowed his attention to his military preparations.

He saw that one need was the fortification of the cities, and the establishment of forts, to give protection against sudden inroads of barbarian horse. He desired that the garrisons of these towns should supply him with a force that he could take to the field independently of the feudal lords, whose power had been rapidly increasing and was becoming excessive. The garrisons were composed of ancient freemen, who had originally formed the *arrière-ban*, but had become vassals of feudal chiefs. By the new organisation they were secured their freedom, and they at once became a powerful support to the throne. They were trained carefully to fight in close ranks, whose solid masses were specially designed to resist the furious charge of the Hungarian horse. Thus the

[1] Gibbon, v. 17; Menzel, i. 307.

cities were made to furnish a well-disciplined body of free-born infantry.

To supply a force of cavalry, Henry had recourse naturally to the feudal aristocracy. He was well aware of the loss of power caused by the disorderly and irregular manner in which the dukes, grafs, and other chiefs, displaying their own banners and followed by their bands of vassals, rushed to the attack in daring but tumultuous rivalry.

In dealing with proud nobles impatient of restraint, ignorant of discipline, and strangers to obedience, it was necessary for the emperor to devise some scheme flattering to their pride, and appealing to their chivalrous notions of honour which would induce them willingly and cheerfully to bestow the time and trouble necessary to train them to fight in close ranks. He well knew that it was by strict discipline and skilful manœuvres alone, that the Hungarian horsemen could be met with success.

Henry is said to have established a chivalric institution, giving rise to new manners and a new enthusiasm which produced very marked results. The tournament, according to some German writers, was instituted by him, in which the knights carried on every species of warlike drill and exercise, making trials of skill in pairs and by troops, in presence of the ladies whose glances were supposed to incite the knights to the greatest efforts. Banquets and dances, being the sequel to the harder employment of the day, rendered these exercises the most popular amusements of the age.

It is most probable that these trials of skill were simply instituted for the purpose of drilling the knights, and were not similar to the tournaments of subsequent ages, although they may have been the origin of them.[1] The tournament proper cannot be traced back further than the middle of the 11th century.

A brotherhood or confraternity of arms subsequently arose bound to the observance of peculiar laws, to fight only for God, to abstain from all dishonourable means of success, and to live and die solely for honour.[2] As all freemen might hope by brave deeds in the field to enter this body, it tended to place the vassal in a better position and more on a level with his lord as a confederate in the same chivalric fraternity.

The free citizens, seeing the advantage of serving mounted, and tempted by the desire of becoming knights, formed themselves into cavalry and created a fresh body of infantry out of their apprentices and workmen.

These facts all prove the great attention paid to the im-

[1] Hallam, iii. 406. [2] Menzel.

provement of the military art during the nine years of truce. On its expiry in the year 933, the Hungarian ambassadors came to demand payment of the yearly tribute. The legend tells that Henry caused a mutilated mangy dog to be thrown before them and at once declared war.[1] The Hungarians instantly crossed the frontier in two large armies, the smaller of which, 50,000 strong, was defeated at Sonderhausen by the *arrière-ban* of Saxony and Thuringia, who in nine years of peace had been well trained to meet the invader.

The decisive battle, however, took place at Merseburg, where the main body of the Hungarians was met by Henry himself at the head of his carefully disciplined and well-equipped army. His knights, or cavalry, used both bucklers and lances. The emperor addressed his troops on the morning of the fight. "My companions," said he, "maintain your ranks, receive on your shields the first arrows of the Pagans, and prevent their second discharge by the equal and rapid career of your lances." Here we see the spirit of Alexander the Great and of Hannibal again showing itself. Again we see the idea of the impetuous rush of the charging horsemen being used to crush by the mere momentum the irregular and indecisive tactics of the skirmishing Hungarians. With equal speed and endurance Henry's tactics could not fail of success.

Although Henry adopted this plan with his main body of cavalry, he did not disdain to fight his foes with their own weapons, for he had also carefully prepared a force of light horsemen armed with crossbows, who distracted the enemy's attention during the whole day by skirmishing with his cavalry.[2] Nor did the emperor neglect to secure every tactical advantage in the battle, for, turning their line with the flower of his cavalry, he headed a decisive charge in the crisis of the action full upon their flank, and put them to complete rout. His conduct after the battle proves his great capacity as a cavalry general, for the pursuit was prompt and vigorous.[3] There was no rest given to the fugitives, who were cut down as they were overtaken. The carnage was excessive, there being no cessation until the scattered remnants of the routed barbarians were driven across the Bohemian frontier.

The victory was decisive, so much so that the balance of morale between the two nations was reversed, and the Hungarians from that time had as great a terror of the Germans as the Germans formerly had of them. Twenty years later a new generation of Turks had grown up, who, to the num-

[1] Menzel, i. 321. [2] Nolan, 11. [3] Ibid.

ber of 100,000 horse, invaded the territory of King Henry's son, Otto the First, who handled with great ability the cavalry which his father had organised. The barbarians, confiding in their great numerical strength, boasted that their horses should drain every river in Germany. They besieged Augsburg, which was bravely defended. Otto called out the *arrière-ban* of the empire, and the Bohemians joined him.[1] The two armies met near Augsburg on the 10th August, 952.[2] The Hungarians crossed the Lech secretly, and fell upon the rear of the German army, defeated the Bohemians, and pressed hard upon the Swabians.[3] The battle swayed backwards and forwards with varying success. The emperor himself fought sword in hand, at the head of his mailed cavalry, striking by repeated charges upon one point until success was gained, which was promptly followed and perfected by the light cavalry, while the heavy cavalry were gathered up and kept in hand, to strike again and again with impetuous charges, where the fortune of the field was in doubt. The result was long undecided. The Hungarian horsemen, excellent light cavalry, scattered and gave way before the heavy charges, but soon rallied and attacked again, skilfully avoiding coming to close quarters, yet always harassing and wearying their opponents.[4] The good discipline of King Otto's troops, and his own cautious and able generalship, alone gave him the victory.

[1] Nolan, 11. [2] Menzel, i. 334. [3] Gibbon, v. 420. [4] Ibid.

CHAPTER V.

CHIVALRY.

SECTION I.—INSTITUTION AND RULES OF THE ORDER.

ABOUT the period of the battles of Merseburg and Augsburg, that is to say about the middle of the tenth century, an institution arose in Europe which exerted a most extraordinary influence upon that continent for some hundreds of years.

Chivalry was without doubt one of the most important causes of the elevation of society from barbarism to civilisation. It gave the tone to the morals of the people, it gave new rules for deciding social precedence, it was the nucleus and foundation of the military power of nations, and its customs and regulations contain the substance of the art of war during its existence.

As every knight or member of the order of chivalry was beyond everything a cavalier, as his title to his rank was primarily based upon his reputation as a cavalry soldier, no history of the cavalry service would be complete without a full reference to the time when that service contained within its ranks all the warriors, the statesmen, the nobles, and the generals of the age, and when the highest ambition of the proudest feudal chief was to be able as a skilful cavalier to enter the order of knighthood.

The origin of the order of chivalry is somewhat uncertain. As one of the rules connected with it entailed certain observances in the inauguration of the knights, somewhat similar to the rites used in granting arms to the youth among the early Germans, as described by Tacitus, it has led some writers erroneously to date back the institution to those remote times. Others have considered that it was in existence as far back as the reign of Charlemagne, because rare instances have been recorded in his time and earlier where

sons of monarchs assumed arms with certain ceremonies of investiture. There is no doubt, however, that the custom of granting arms to the young men on arriving at maturity, with certain solemnities, was in use among most of the tribes of Europe from time immemorial.

But the ceremonial of investiture of knighthood was but a small part of the institution of chivalry, and but an empty form connected with it. The guiding principles of the order were, the spirit of high honour contained in its rules, the courtesy shown to all, the charity to the oppressed, and the abstract love of justice. These were the striking peculiarities which produced such wonderful and beneficial results in humanising mankind, and which formed the real institution of chivalry, and in that view, knighthood dates from the middle of the tenth century.

The best authority on this subject is perhaps M. La Curne de Ste. Palaye, and in the introduction to a late edition of his "Mémoires sur l'Ancienne Chevalerie" by Ch. Nodier, there is given a very interesting account of the institution of knighthood. It is as follows:—"Towards the middle of the tenth century, some poor nobles, united by the necessity of a legitimate defence, alarmed by the excesses caused by the multiplicity of sovereign powers, took pity on the miseries and tears of the people. They grasped each other's hands, invoking God and St. George to witness that they devoted themselves to the defence of the oppressed, and took the weak under the protection of their sword. Simple in their dress, austere in their morals, humble after victory, firm and stoical in adversity, they soon acquired an immense renown. Popular gratitude, in its simple and credulous joy, fed upon marvellous recitals of their deeds of arms, exalted their valour, and united in prayer their generous liberators with the powers of heaven. So natural is it for misfortune to deify those who console it.

"In those old times, as strength was a law, courage should be a virtue. These men, afterwards called knights, carried it to the very highest degree. Cowardice was punished among them as an unpardonable crime, and so it is to refuse assistance to the oppressed. They held a lie in horror, they branded with infamy, treachery and breach of faith, and the most celebrated lawgivers of antiquity have produced nothing comparable to their statutes.

"This league of warriors retained during more than a century all its original simplicity, because the circumstances in the midst of which it arose changed slowly; but when a great political and religious movement announced the coming

revolutions in the human mind, chivalry took a legal form and a rank among recognised institutions."

Before this we have seen that the feudal system had already given an ascendency to the landed aristocracy, and to the heavy armed horseman. Discipline had also been at a very low ebb, and the infantry service had fallen into disuse, or was of a very inferior quality. The unsettled state of Europe, and the continual wars and skirmishes between rival feudal chiefs, had destroyed the art of manœuvring in large masses, and had given constant opportunities for the display of personal prowess. This paved the way for the foundation of chivalry, for the confidence of these mail-clad horsemen in their personal skill in the use of arms increased their courage, and made them more adventurous and more greedy of renown. So individual honour and glory became the soul of chivalry and its primary principle. This idea is more clearly shown by the customs of the knights-errant, who fought not from national sentiment or religious feeling, but from a desire of obtaining glory, and from a sort of abstract spirit of justice.

Chivalry, although a cosmopolitan institution, and based upon the same general principles throughout Europe, was nevertheless closely connected with the feudal system, and was to a certain extent affected by the variations in that system in different countries. Where the aristocracy were limited in number, the rules for admission into the order were more stringent, and those attaining to the dignity of knighthood less numerous. In France and Arragon there were few initiated, while in England and Castile they were admitted in great numbers.

The rules for deciding whether a candidate for the honour of knighthood was eligible or not seem to have varied mainly as to the question of birth; in France, for instance noble birth being absolutely essential, while in Spain, England, or Germany, it was not always required. The code of St. Louis was so strict as to enact that "if any man whose father is a plebeian be made a knight, the king or baron on whose estate he is domiciled may order that the spurs of such a pretender be struck off on a dunghill."[1]

Philip le Hardi in 1281 fined the Count de Nevers for knighting two brave brothers who lacked the requisite degree of nobility on the father's side, and fined the two knights also; but afterwards learning that they were very gallant soldiers, he relieved them of a great portion of the fine, and confirmed them in their rank.

[1] Löwy, 30.

Chivalry placed the feudal nobles and knights of all nations upon an equal footing with each other, and gave to the younger sons of the nobility, who could not hold the position of feudal barons, an opportunity of winning by their swords and prowess a rank which, while not representing the possession of wealth or land, still placed them socially, and in a military point of view, on a par with the senior members of their families.

These young men usually attached themselves to the following of some rich lord or prince, at whose court they could look for constant employment, for opportunities for advancement, and for maintenance and support. They usually received pay in some form or other, and were, virtually, stipendiary soldiers. Their great ambition was to win the spurs of knighthood in their master's service, an object of ambition earnestly toiled for and eagerly desired, as it raised the recipient to a certain equality with his lord, and entitled him to privileges that wealth alone could never give.

The young lad commenced his education for the dignity of knighthood at his seventh year, prior to which time he was in the care of the females of the family.[1] At the age of seven he was either sent from home to the castle of some friendly lord, where he acted as a page, and served his master in that capacity, or he was set to perform the same duties for his own parents. Until the age of fourteen the lad served as page, his position not being much better than that of the domestics of the household, and during the whole period he was constantly trained in bodily exercises, and to a certain extent in horsemanship. At fourteen he attained the rank of squire. This was considered a position of importance, and the promotion was marked by a religious ceremony, to impress upon the youth the use he was expected to make of the sword, then for the first time placed in his hands.

The page was led to the altar by his father and mother carrying lighted tapers.[2] The officiating priest took from the altar a sword which had been placed there, and after blessing it, girded it about the young nobleman, who from that time had the right to carry arms. The squire then devoted himself to the use of arms, and to a variety of exercises calculated to increase his bodily vigour and activity, and in company with his comrades continually practised the management of the lance and sword on horseback. There were many distinctions maintained between the squires and the knights, both in dress and equipment.

[1] Löwy, 30. [2] Ste. Palaye, i. 9.

The squires were only allowed ornaments of silver; gold being reserved for the exclusive use of the knights. Their defensive armour was much lighter than that used by their masters, both at war and in the tournament. They were forbidden to wear scarlet, though they might dress in furs or silk. They performed services of every sort: some acted as carvers at the table, some poured out wine, some offered water for ablution. Services considered menial among the Romans, and also at the present day, were then performed by noblemen of the highest birth. The squires so serving at table did not join in the conversation, but were enabled in that way to learn the manners of society, and the habits of courtesy. The Count of Artois, brother of King Louis IX., waited upon the king at dinner at the Court held by St. Louis at Saumur, and he was assisted by the Count de Soissons.

In war, however, the squires accompanied their masters as aids and assistants. They carried his armour among them, one carrying the helmet, another the lance, another the sword, &c. One also led the charger, which was a large powerful animal that was only used in action. On the march the knight rode a palfrey or easy-paced horse, and on the approach of danger he mounted his charger, and his squires proceeded to arm him. This was a duty requiring great care and skill, as the safety of the combatants depended often upon the attention that had been bestowed on arming them. Neglect in fastening the visor on Henry II.'s helmet is supposed to have been the cause of his death.

When the knights were fully armed and mounted upon their battle horses and the action was about commencing, they were ranged in single line, the squires forming a second rank behind their lords. The knights charged in full career, with lances in rest, while their attendants remained idle spectators of the fight. If the knight was unhorsed, he raised himself from the ground, if able to do so, and taking his mace or sword or battle-axe, continued the combat on foot. Each squire attentively watched his own master during this struggle, and if hardly pressed, came to his assistance, giving him a fresh horse in case of need, or new arms. He also defended him from blows if wounded, and used every possible means to aid him, but in doing so confined himself strictly to the defensive. If the knight was victorious and captured any prisoners, it was the duty of the squires to receive and guard them.

These officers, thus close and interested spectators of the manner of carrying on war, were taught by example how to conduct themselves in action. In this way they served a

species of apprenticeship, and were qualifying themselves for the dignity of knighthood.

The squire arriving at the age of twenty-one years was then considered sufficiently educated and eligible for admission to the order, which was only conferred upon his giving proofs of valour and skill in the use of arms in the field. He was, however, invested with arms, and entitled to engage in the front line, from which he had hitherto been debarred.

The investiture of the knight was more formal than the granting of arms to the squire. The young gentleman passed the night before the ceremony in prayer with a priest and his sponsors, in a church or chapel. In the morning he took a bath, put on a white dress as a symbol of purity, and listened to a sermon on the duties he was about to assume. He then advanced to the altar with a knight's sword slung around his neck, which he presented to the priest who blessed it. The novice then kneeling down was invested with a complete suit of armour. The ceremonies varied somewhat in different countries and at different times, but the accolade or stroke on the shoulder with the sword was never omitted, and was generally given with the words, "In the name of God, of St. Michael, and St. George, I make you knight." Sometimes the words were added, "Be brave, bold, and loyal."

Knights were made on the field of battle by the simple accolade, and the formula of words mentioned.

There were two elements connected with chivalry at different periods, which, although not of much interest, in a military point of view, yet cannot be passed without notice, namely, religion and love. The Crusades, partly the outcome of this religious feeling, had the effect of increasing it very materially, so that when the institution was in its highest vigour, its connection with the Church was very intimate. This is shown by the religious character of all the ceremonies of investiture, the vigils in the chapel, the early mass, the bath, the symbol of baptism, the blessing of the arms, the sermon, &c. The knights were taught to consider their first duty that of maintaining the gospel by their swords, and at one time it was customary for them to hold their unsheathed weapons upright before them, during that portion of divine service when the gospel was being read, intimating thereby their willingness to defend their faith at the point of the sword. The cause of this curious connection of religion with a military order is evidently to be found in the desire of the priesthood to turn to the advantage of the Church a popular idea that was exerting a very powerful influence.

The other guiding sentiment, that of love, can have its origin traced to the early habits of the Germans, who were remarkable for the extraordinary respect with which they treated the women of their tribes.[1] The increase of wealth in the hands of the nobility, and the luxurious and cultivated habits of social life, which are the natural results of riches, tended also to give the ladies greater influence, as their means and position gave them every opportunity of acquiring all the refinements in dress, in conversation, and in manners, which have so much effect in securing the admiration and respect of the stronger sex.[2] There is also an instinctive desire among men to display their superior strength, courage, and dexterity before the objects of their admiration. The influence of love thus naturally soon became paramount in an order whose animating sentiment was the ambition of acquiring personal renown by deeds of arms in action and daring adventures in the field.

At first religion was the prevailing sentiment, and the effect was perceived in the Crusades, and for a long period this influence was powerfully felt in the order. The exaggerated ideas of love which afterwards became so common among the knights began to show themselves as the feeling in favour of the Crusades died out, and although for a long period the two sentiments of religion and love were combined together, yet at first one was the prevailing idea, and then gradually the other assumed that position. In the time of Edward III., and down almost to Henry VIII. of England and Francis I. of France, the knights made the most fantastic vows in honour of their mistresses. The two ideas were, however, long recognised as the guiding principles of chivalry, and God and love were taught to be honoured and maintained as a single duty.

Boccaccio returns thanks to God and Love for the assistance giving him in writing the Decameron.[3] Froissart, making a collection of poetry, announces that he undertakes the work with the help of the same powers. The courtesy to ladies was very marked, the protection to the widow and orphan, and to the distressed, was an obligation looked upon as a religious duty, and the weak and the oppressed never appealed to the knight for aid in vain.

The effect of this feeling, in gradually eradicating the vices and treachery that had been common among the barbarous tribes, was extraordinary, and the kind and courteous treatment of prisoners of war so very different from the cruelties of the early ages, did much to Christianise and civilise the

[1] Tacitus, Germany, ch. viii. [2] Hallam, iii. 396. [3] Löwy, 41.

world. The benefits of chivalry in this way can hardly be over-estimated.

SECTION II.—EQUIPMENT, ARMAMENT, AND TACTICS.

The knights were always clad in armour. At first they wore coats of mail composed of steel rings interwoven, or of scales. When this was the prevailing defence, the head was protected by a closely fitting cap of mail, made in the same way as the body armour. It covered the face to the forehead, left the lower portion unprotected, but had a flap or curtain hanging down to defend the ears and back of the head.[1] They wore a helmet over this cap of mail, but it was only put on at the moment of going into action.

In time as solid armour came into general use the helmet assumed a conical shape, and was round at the top; a skull cap only was worn under it to protect the head from its weight.[2] It was added to by plates of metal for the protection of the neck, and a visor or covering for the face was adopted, which varied in shape and arrangement almost indefinitely. Sometimes bars were placed across perpendicularly, sometimes crosswise at right angles, and sometimes perforated plates, covered the face with small openings to see and breath through. Crests of various devices surmounted the helmet.

The squires, foot-soldiers, and mercenaries wore the bascinet, a lighter kind of head covering, which had projections in front and rear, and sometimes ear-pieces covered with metal scales and clasped beneath the chin. The knights often wore these light head-pieces when they did not expect an immediate attack, yet did not desire to be entirely defenceless in case of a sudden emergency.[3]

As to body armour the knights were most heavily armed, more so, probably, than the cataphracti of the ancients. In the early times of chivalry, the defence for the body consisted of chain and scale armour; the hauberk of wrought-iron rings, set on a garment of leather, and worn over a buff, or leathern, or quilted under garment, being the principal protection. These ringed coats were of four sorts—some being made of flat rings, sewed on side by side, some of oval rings overlapping each other, some of lozenge-shaped pieces of metal, and some of scales.[4] In addition to these varieties was the coat of real chain mail.

The hauberks, or coats of mail, reached to the hips in the tenth century, and in the next were lengthened till they

[1] Löwy, 81. [2] Ibid. [3] Ibid. 82. [4] Demmin, 41.

reached the knees. William the Conqueror's Norman knights, in the invasion of England, were so armed, and are so represented in the Bayeux tapestry. In the first crusade the knights are supposed to have been armed in this way. In the twelfth century the rings were interlaced, and the mail was often strengthened by having them double. The coats of mail were very pliable, and were worn loosely over the body. The same material was used for covering the feet and legs.[1]

The Gambeson, or under garment, was generally stuffed with wool and quilted, and was a protection as well against weapons as against injuries caused by the chafing of the armour, the weight of which was very burdensome.

In course of time the chain mail was first added to, and then superseded by plate armour, which was made of solid pieces with movable joints, to meet the requirements of the human frame. These were first attached to the arms and legs, afterwards they were applied to the protection of the body, and for a long period a species of mixed plate and chain armour was preferred by the knights. The heavy plate armour was often worn over the hauberk, the horsemen believing the polished plates, from which the sword or lance glided easily, to be a better defence than the coat of mail, which was not proof against injury. The invention of gunpowder also placed the solid armour in higher favour than ever, as it was a better protection against fire-arms. This kind of defence was maintained in use until the end of the seventeenth century, when it was reduced, the breast and back pieces only being retained, and being much about the same as those at present used by the cuirassiers of most European armies.

With the plate armour came into use also the hook, or lance rest, which was attached to the breastplate, to aid the knight in holding his lance up steadily while making a charge, whence comes the phrase of putting the lance in rest as in the passage:—

> "A thousand spurs are striking deep,
> A thousand spears in rest;
> A thousand knights are pressing close
> Behind the snow-white crest."

When chain armour was in use the horses also were covered with it, as they were armed afterwards with solid plates, when their riders adopted that kind of protection. Before the introduction of fire-arms, these powerfully armed

[1] Löwy, 85, 86.

knights were almost impregnable, and the art of defensive warfare was far superior to the arts of destruction. This, of course, gave an enormous influence to the nobility, who alone were able, or permitted, to provide themselves with the elaborate equipment of a knight. They were, however, very unwieldy, and paralysed by the weight of their armour, so much so that rapid evolutions could not be carried out by them,[1] and sometimes, as at Agincourt, the superior activity of the light-armed infantry was more than a match for them.

The French knights also suffered severely in the contests with the troops of the cities of Flanders.

The heat of summer was insupportable to the wearers of heavy armour, whilst the slightest impediment delayed them, or threw them into confusion.

The different parts of armour, in addition to the Gambeson, or under garment, were—

1. The *hauberk*, or coat of mail.
2. The *breast and back plates*, or cuirass.
3. The *helmet*, or head-piece. The larger head coverings being called *heaumes* or helms, the later ones helmets.
4. The *haussecol*, or *gorget*, covering the throat.
5. The *pauldrons*, or *epaulières*, covering the shoulders.
6. The *brassards*, or rear and vambraces, covering the arms.
7. The *gantelets* (mitten, or fingered), covering the wrists and hands.
8. The *cuissards*, or cuisses, covering the thighs.
9. The *tassettes*, covering the hips (or rather the pockets, derived from the German word for pocket).
10. The *greves*, *jambes*, or *jambeaux*, covering the legs.
11. The *genouillières*, covering the knees.
12. The *sollarets*, or *sabbatons*, covering the feet.

The shield was made sometimes of metal only, and sometimes of wood covered with hide or metal, and bearing armorial devices. It varied in shape, and, when not required in action, was carried by a strap over the shoulder.

The spurs were first formed of a single spike, but in the fourteenth century a rowel was adopted, of the style used in modern times, but the rowels were of a far larger size than are now worn anywhere, except, perhaps, in Mexico and South America. The spurs of the knights were of gold, and were the best known mark of his rank; "winning his spurs" being synonymous with attaining the grade of knighthood. A surcoat of fine cloth or silk, adorned with the colours and devices of the knight, was worn over the armour.

[1] Löwy, 88.

Saddles are said to be first mentioned by Sidonius Apollinaris in reference to the Visigoths.[1] In the eleventh century large projections were added to the saddle in front and rear, to support the heavy armed knights, and make their seats more comfortable and more secure.

The principal weapon was the lance, which was looked upon as the most noble of all arms, its use being forbidden to the plebeian ranks. They were of great size, and made of the wood of the aspen, pine, sycamore, or ash trees, with an iron head, heavy, blunt, and broad. A flag was attached, just below the iron head, which indicated the rank of the bearer,[2] for although the knights were all considered to be upon an equality, there was a distinction between those who were wealthy and able to furnish a contingent of armed men at their own expense and the knight who went to the field with his personal attendants only. The former was entitled a knight, or chevalier banneret, while the latter was simply a knight bachelor. The bannerets carried a small pennon, or square banner, attached to their lances,[3] while the ordinary knight carried a small flag which was indented, and terminated in one or two points.

The lance had a small shield or vamplate screwed to the shaft just above the gripe, for the protection of the hand. Sometimes it had a hole in the centre, and was slipped on over the point and pushed back to the handle, where the increased size of the wood held it firm.

In addition to the lance the knight was armed with a sword which varied much in shape, sometimes being double-edged, sometimes only single. They were generally straight, but curved falchions were often used. They were of all lengths, some two-handed, and as much as seven or eight feet in length. These large two-handed swords were not used by the knights on horseback, for they always dismounted when they wished to use them. A small sword or dagger was sometimes attached to the pommel of the knight's saddle, while the heavy sword was usually worn on a belt on the left side. These weapons were held in high consideration, and were elaborately ornamented, the hilts being often studded with jewels, and the blades bearing inscriptions. The sword could only be worn by freemen, and delivering it up was the usual form of surrender.

The dagger was always a portion of the knight's equipment, and was worn at the right hip. It was used to give the final blow, when the knight had thrown his opponent to the ground and conquered him.

[1] Löwy, 93. [2] Ibid. 62. [3] Ibid. 38, 39.

Battle-hammers were used long before the institution of chivalry. Charles Martel took his name from the martel or hammer, which was his favourite weapon, and was used by him at Tours in 732. These weapons had a hammer at one side and a pick at the other; they were used during the middle ages as late as the fourteenth century,[1] and were looked upon as knightly weapons. So also were the battle-axes, which varied much in size and shape, and were very generally used. The mace or club of iron or of wood with spikes, was another weapon sometimes used by the knights, but common also to the lower orders.

The tactics of the knights were of the simplest character, and the organisation into tactical divisions was, comparatively speaking, unknown to them. The only semblance of a tactical unit seems to have been the "*lance fournie*," which was composed of the knight who carried his lance, and his satellites or attendants.

In referring to the Gaulish cavalry in the time of the Romans, we have already seen the idea in use in the Trimacresie mentioned by Pausanias. These little parties consisted of only the chief and two attendants, while the "lance fournie" contained more followers. The number varied in different countries and at different times, and it became a more recognised institution in the later periods of chivalry, and upon the formation of mounted gendarmerie. At first the lance consisted simply of the knight, his esquire, a coutillier who was of nearly the same rank as the squire, a page, a valet, and three archers all mounted.[2] This little corps was the unit for all purposes of administration, the knight evidently maintaining and supplying with necessaries his own immediate followers. The knights bannerets commanded several of these lances, and in the old chronicles the strength of an army was always recorded in lances. Where we say now sixty or seventy squadrons they would say 200 or 300 lances, always including the attendants in the term "lance."

According to Bardin, the capitulaires show an organisation of the lances in the feudal armies of some countries by which ten "lances" containing some fifty or sixty horsemen formed a *bacèle*, and that five of these united together formed a species of regiment of fifty lances, or about 300 cavalry, under the command of a knight banneret.[3]

It is known also that armies were divided into three portions, the van or centre and the two wings, which were generally under the command of the leading generals. The

[1] Löwy, 75, 76. [2] Bardin, 3022, 3023. [3] Ibid. 3022.

lance fournie varied in numbers from three satellites to fourteen, but six or seven was the ordinary strength.

The knights fought in action in single line, and their tactics consisted in charging, lance in rest, with the object of unhorsing their opponents. After the shock, the struggle generally merged into a close hand-to-hand fight with swords, battle-axes, maces, and hammers. The squires formed a second line, having the other followers in their rear. They were not armed sufficiently to charge in line of battle like the knights, although the squire sometimes advanced and filled the place of his master in case of his death. The real duty, however, both of the squire and the other attendants, was to aid and assist the knight in the combat, to raise him if wounded or unhorsed, to remount him, and to supply him with fresh weapons. The squire wore a corslet of mail and a light helmet. His arms were the sword, the battle-axe, and the poignard.

The archers were young gentlemen who were aspiring to the rank of squire, and who attached themselves to some knight to fight in his suite. They were armed lightly with a casque and gauntlets of mail.[1] They sometimes dismounted to fight on foot, in which case the pages held their horses. The archers-à-cheval formed the light cavalry, and although Humbert says they used the bow, yet Bardin distinctly states that the French archers did not fight with the bow but with the crossbow, and that, properly speaking, they should be designated Arbalétriers-à-cheval.

Their proper place was in rear of the squires, although they often skirmished before the action in front of the line of battle, and when driven in, or when they saw signs of hesitation in their opponents, they retired around the flanks and left the plain open for the charge of the heavy armed knights. They sometimes also fought on the flanks, and in case of victory they were used in following up the pursuit. There was no system of tactical formation by which bodies of troops manœuvred together, and mutually supported each other in masses. In fact, the tactical art was almost unknown, and a battle was not won by manœuvres or by skill, but by mere brute force. The field of battle was simply an aggregation of thousands of single combats or duels. The only idea of tactics was to get the advantage of the wind or sun, as having either facing them exercised an important influence on combatants, who only saw through a narrow aperture with difficulty, and whose vision the glare of the sun, or the slightest dust, would materially impair.

[1] Bardin, 223.

The great spread of chivalry, and its universal character, caused this want of tactical ability to be unnoticed, for as all nations fought on the same principles, they did not perceive the necessity or advantage of manœuvring. The generals were not tacticians, but were simply the warriors most noted in the armies for their personal skill and bravery in hand-to-hand fighting.

The training in peace, as already mentioned, was very severe and incessant—the gymnastic exercises being of the most difficult and laborious type—so that it is certain that at no period before or since was individual prowess and perfection of personal training so completely attained as during the palmy days of chivalry. The object of life, from early youth upwards, was to obtain the fullest development of strength and skill in the use of arms and horsemanship of which the human frame was capable. The business of life was the preparation for, and the accomplishment of feats of arms in war; the amusements and recreations of peace were found only in the chase and in the mimic conflicts of the tournament.

But the military art was lost for the time. Each knight, aided by his squires, fought a small battle on his own account, and instead of a general action being guided by scientific rules, it was but an aggregation of confused combats between chiefs, who were all on a dead level of equality with each other.

The immense social influence of chivalry, the great protection given by armour, the neglect of the infantry service, and the contempt into which that service naturally fell when composed only of the lowest classes, all tended to give the knights an exalted idea of the cavalry service, and a contempt for the infantry that was not justified.

A good infantry, well armed with powerful pikes, and carefully disciplined, could have always defended themselves against the attacks of the undisciplined and ill-combined bodies of heavy armed horsemen, whose efforts must have lacked solidity of order and unity of direction. But when all Europe relied on the mounted knights, when no man of position or influence dreamt of serving in anything but the cavalry, who was to take the lead? Who to organise the infantry of the classes fit for soldiers, and to arm them with the weapons fit for service?

The day did come, as we shall see subsequently, when the people of Switzerland, who, by the physical character of their country, could not maintain cavalry, and were obliged to rely mainly upon their infantry, did organise a force of foot-

soldiers which, when brought into contact with the proud chivalry, taught them that prowess was not everything, but that order, solidity, and art exercised a very important influence in war.

The feudal armies, in fact, were not organised upon a principle that would permit of the growth or use of tactical skill. They were composed of raw levies of soldiers, who were, individually, thoroughly trained to the use of their weapons, and well equipped, and, taken singly, were probably as fine material as ever fought in action; but their feudal tenure usually required only forty days' service a year, so that they were only mobilised just as they commenced a campaign, and there was no time to teach them to act harmoniously together in masses. High tactical skill can only be acquired by thorough training, and can never reach perfection except in a military system based upon a standing army.

The great development of the art of manœuvring and handling troops in large masses among the Romans, especially in the days of Scipio, may be attributed to the fact that the service in the Roman army varied from ten to twenty years.

The tournaments, which were the only military exercises among the knights of the middle ages, were not of much use as schools of tactics, for the jousts and passages at arms taught only dexterity in the use of weapons in single combat. Even in the exercises where two parties fought, one on each side, there was no appearance of art in the manner of fighting. The contests were simply a series of duels, where no element was brought into play except downright hard blows, skill in the use of weapons, and endurance. When we remember that a suit of tilting armour weighed as much as 200 lbs., we can readily understand that endurance was a very important quality.

The tournaments were not maintained solely for the purpose of improving the dexterity of the knights, although that was one object. They were almost the only amusement of that age, and were very popular, inasmuch as they gave an opportunity for gathering large numbers of the nobility together, where they could display their knightly graces, in the management of their horses and weapons, in the presence of the ladies. The games or exercises generally commenced with a combat between two parties led by two leaders. The weapons were blunted, and the regulations made for the purpose of preventing serious wounds were very full and particular. The squires and attendants formed behind their masters as if in action, to assist them if dismounted. The armour used in tilting was very much heavier than that used

in war, as no man could have worn tilting armour through a contested battle. In fact, knights were occasionally smothered in their armour in the tournaments.

Simulated attacks and defences of fortresses or entrenchments were also one of the displays common at tourneys, but they taught no art of manœuvring, they were all simply rehearsals of the same type of severe hand-to-hand struggles between knights.

During the period of chivalry, as we have said, the art of war was at a very low ebb. The infantry had gradually declined until their influence on the result of battles was reduced to nothing, and we look in vain for evidences of tactical skill in the battles of the age. In one or two actions only do we see the slightest trace of battles being won by the use of stratagem, or of manœuvres upon the field.

The battle of Hastings, fought on the 14th of October, 1066, between William the Conqueror at the head of his Norman chivalry, and the Saxons under Harold, is the most striking instance of the tactics of the time. King Harold took up a defensive position and protected his front by a fence made of shields and wicker-work. His army was composed mainly of foot-soldiers, while William's was almost altogether cavalry We have fortunately a very detailed account of this battle by Robert Wace, who wrote it in the reign of Henry II., about ninety years after the battle, when the facts were fresh in the memory of the people.

This account gives an accurate picture of the method of fighting of that time, and as it contains the details of the most important, most decisive, and most skilful battle of the age, it will be of great interest to the reader to reproduce some extracts from it, in its quaint and picturesque phraseology. After describing the landing and the approach of the two armies towards each other, the poet proceeds [1]—

"William sat on his war horse, and called out Rogier, whom they call de Montgomeri. 'I rely much on you,' said he; 'lead your men thitherward and attack them from that side; William, the son of Osber the seneschal, a right good vassal, shall go with you and help in the attack, and you shall have the men of Boilogne and Poix and all my soldiers. Alain Fergant and Aimeri shall attack on the other side; they shall lead the Poitevins and the Bretons, and all the barons of Maine, and I, with my own great men, my friends and kindred, will fight in the middle throng where the battle shall be the hottest.'

[1] Robert Wace's Roman de Rou, translated by Taylor, page 171, et seq.

"The barons and knights and lancemen were all now armed, the men on foot well equipped, each bearing bow and sword; on their heads were caps, and to their feet were bound buskins. Some had good hides which they had bound round their bodies, and many were clad in frocks, and had quivers and bows hung to their girdles. The knights had hauberks and swords, boots of steel, and shining helmets; shields at their necks, and in their hands lances. And all had their cognisances, so that each might know his fellow, and Norman might not strike Norman nor Frenchman kill his countryman by mistake. Those on foot led the way with serried ranks bearing their bows. The knights rode next supporting the archers from behind. Thus both horse and foot kept their course and order of march as they began, in close ranks, at a gentle pace, that the one might not pass or separate from the other. All went firmly and compactly, bearing themselves gallantly, and in each host stood archers ready to exchange shots.

"Harold had summoned his men—earls, barons, and vavassors, from the castles and the cities, from the ports, the villages, and boroughs. The villains were also called together from the villages, bearing such arms as they found—clubs and great picks, iron forks and stakes. The English had enclosed the field where Harold was with his friends and the barons of the country, whom he had summoned and called together. . . . .

"Harold knew that the Normans would come and attack him hand to hand: so he had early enclosed the field in which he placed his men. He made them arm early and range themselves for the battle, he himself having put on arms and equipment that became such a lord. . . . He commanded his people, and counselled his barons to keep themselves all together, and defend themselves in a body; for if they once separated, they would with difficulty recover themselves. 'The Normans,' said he, 'are good vassals, valiant on foot and on horseback, good knights are they on horseback, and well used to battle; all is lost if they once penetrate our ranks. They have brought long lances and swords, but you have pointed lances and keen edged bills, and I do not expect that their arms can stand against yours. Cleave whenever you can, it will be ill done if you spare aught. . . . .

"The English peasants carried hatchets and keen edged bills. They had built up a fence before them, with their shields and with ash and other wood, and had well joined and wattled in the whole work, so as not to leave even a crevice, and thus they had a barricade in their front, through

which any Norman who would attack them must first pass. Being covered in this way by their shields and barricades, their aim was to defend themselves; and if they had remained steady for that purpose; they would not have been conquered that day; for every Norman who made his way in lost his life in dishonour, either by hatchet, or bill, by club, or other weapon. They wore short and close hauberks and helmets, that hung over their garments. . . . . They stood in close ranks, ready and eager for the fight, and they had moreover made a *fosse*, which went across the field guarding one side of their army.

"Meanwhile the Normans appeared advancing over the ridge of a rising ground, and the first division of their troops moved onwards along the hill and across the valley. Then another division still larger came in sight, close following upon the first, and they wheeled toward another side of the field, forming together as the first body had done. Then a fresh company came in sight, covering all the plain; and in the midst of them was raised the gonfanon that came from Rome. Near it was the Duke, and the best men and greatest strength of his army were there. The good knights, the good vassals, the brave warriors, were there, and there were gathered together the gentle barons, the good archers, and the lancemen, whose duty it was to guard the Duke and range themselves around him. The youth and common herd of the camp, whose business was not to join in the battle, but to take care of the harness and stores, moved off towards a rising ground.

"Harold saw William come, and beheld the field covered with arms, and how the Normans divided into three companies, in order to attack at three places. His brother Gurth drew near, and they placed themselves by the standard, each praying God to protect them. Around them were their kinsmen, and those barons who were their nearest friends: and they besought all to do their best, seeing that none could now avoid the conflict. Each man had his hauberk on with his sword girt, and his shield at his neck. Great hatchets were also slung at their necks, with which they expected to strike heavy blows. They were on foot in close ranks, and carried themselves right boldly.

"The Normans brought on the three divisions of their army, to attack at different places. They set out in three companies, and in three companies did they fight. The first and second had come up, and then advanced the third, which was the greatest; with that came the Duke, with his own men, and all moved boldly forward.

"As soon as the two armies were in full view of each other, great noise and tumult arose. You might hear the sound of many trumpets, of bugles, and of horns; and then you might see men ranging themselves in line, lifting their shields, raising their lances, bending their bows, handling their arrows, ready for assault and for defence.

"Forthwith arose the noise and cry of war, and on either side the people put themselves in motion. The Normans moved on to the assault, and the English defended themselves well. Some were striking, others surging onward, all were bold and cast aside fear. And now behold that battle was gathered, whereof the fame is yet mighty.

"From nine o'clock in the morning, when the combat began, till three o'clock came, the battle was up and down, this way and that, and no one knew who would conquer and win the land. Both sides stood so firm and fought so well, that no one could guess which would prevail. The Norman archers with their bows shot thickly upon the English; but they covered themselves with their shields, so that the arrows could not reach their bodies, nor do any mischief, how true soever was their aim, or however well they shot. Then the Normans determined to shoot their arrows upward into the air, so that they might fall on their enemy's heads and strike their faces. The archers adopted this scheme, and shot up into the air towards the English, and the arrows in falling struck their heads and faces, and put out the eyes of many, and all feared to open their eyes, or leave their faces unguarded.

"The Normans saw that the English defended themselves well, and were so strong in their position, that they could do little against them. So they consulted together privily, and arranged to draw off, and pretend to flee, till the English should pursue and scatter themselves over the field; for they saw that if they could once get their enemies to break their ranks, they might be attacked and discomfited much more easily. As they had said, so they did. The Normans by little and little fled, the English following them. As the one fell back, the other pressed after, and when the Frenchmen retreated, the English thought and cried out that the men of France fled, and would never return. Thus they were deceived by the pretended flight, and great mischief thereby befell them; for if they had not moved from their position, it is not likely that they would have been conquered at all."

This stratagem gave William the victory, for as soon as they were broken in the pursuit, he turned upon the English, and a desperate struggle ensued, in which he was successful.

A charge of cavalry, led by the Norman Duke, is described in the following words:—

"Then those who kept close guard by him, and rode where he rode, being about a thousand armed men, came and rushed with closed ranks upon the English; and with the weight of their good horses, and the blows the knights gave, broke the press of the enemy, and scattered the crowd before them, the good Duke leading them on in front. Many pursued and many fled, many were the Englishmen who fell around and were trampled under the horses, crawling upon the earth, and not able to rise. Many of the richest and noblest men fell in the rout, but still the English rallied in places, smote down those whom they reached, and maintained the combat the best they could, beating down the men and killing the horses."

Nothing could give a more vivid idea of the manner of fighting in the eleventh century than this interesting narrative, which has the great advantage of being written shortly after the battle, and of being confirmed in many particulars by the Bayeux tapestry.

The next battle concerning which we have any details, is that of Bouvines, in Flanders, fought in 1214 between Philip Augustus and the Emperor Otho, in which the former won a decisive victory.

Philip's army was composed mainly of cavalry, and he manœuvred to draw the emperor out of some broken country into the plain, where his horsemen could act to advantage. Otho, hearing that the French king was marching away, and believing that he was avoiding the combat, followed him.[1] Philip hearing of it, sent the Viscount de Melun with some light cavalry and cross-bowmen, to make a reconnaissance in the direction of the enemy. He soon met the army of the emperor marching in good order, their horses clad in armour, and the cavalry drawn up in rear of the infantry. This being the usual formation in marching out for battle, the viscount at once saw that they purposed bringing on a general action, and despatched the Chevalier Guerin with the intelligence to King Philip, while he himself remained to watch their movements.

The German army had a large number of infantry, and the chroniclers say that they were drilled to fight on the level plain, and even against cavalry. They were armed with pikes. The emperor drew up his army with the infantry in front, and his heavy cavalry in rear. The English allies were on his right, the Flemish on the left. The French adopted a similar formation, their infantry occupying the front line,

[1] Daniel, Milice Française, i. 211, 212, 213.

the chivalry drawn up in line behind them. We see in the accounts of this battle a glimmering of tactical arrangement, for it seems that the heavy horsemen were ranged in squadrons, with intervals between, through which the infantry marched, after crossing the bridge of Bouvines, in order to take up their position in front. The squadrons most probably were the followings of the different knights bannerets, who were drawn up together, and so formed tactical units. The light horsemen were on the wings supported by heavy cavalry. The battle was opened by the Chevalier Guerin, sending a body of 150 light cavalry, to charge the Flemish gendarmerie of the enemy's left wing. He seems to have taken this course, not with any idea that the small body of lightly armed troops could gain any decisive result, but with the intention of throwing his opponent's ranks into confusion, before leading his main body of heavy armed knights to the decisive charge. He evidently appreciated the value of the last reserve in a cavalry action, and succeeded in obtaining that advantage by the course he adopted. His plans were crowned with success.

The battle in the centre commenced by a fight between the two bodies of infantry, in which the French foot soldiery, raw levies, hastily collected, and badly drilled, were at once defeated by the German battalions, who pressed on, and threw the French horsemen somewhat into confusion. They nearly captured the French king, who was dismounted by the stroke of a javelin which caught in his armour. A desperate struggle ensued, in which close hand-to-hand fighting of the usual determined character was continued for a long time, until the superior skill of the French cavalry decided the day in their favour.

A charge in flank is also mentioned in this battle, as well as a countercharge to destroy the effect of it, which proves that some idea of tactics was beginning to show itself. Another matter mentioned in the account of this action is of great interest, as the first evidence of a reaction in the opinion as to the relative values of the cavalry and infantry.

The heavy armour of the nobles, their skill in the use of weapons, the weight and strength of their horses, and the contempt into which the infantry service had fallen, had resulted, as we have already seen, in making the cavalry not only the all-important, but practically the only service, in the armies of the day. Ideas are always apt to be carried to extremes, and the knights putting their trust in armour, and relying mainly upon its protection for success, increased its

weight, and multiplied its pieces, until it became so burdensome that the warriors were worn out by the exertion required to carry it, and half stifled by the closeness of the the head covering.

When a knight was unhorsed, he was often unable to get up without assistance, and after a little exertion it became necessary for him to take off his helmet to regain his breath. It must have been about this period that one of the German emperors made the remark, that "Armour protects the wearer, and prevents him from injuring others."

The difficulty caused by the excess of armour is strongly shown by two incidents which occurred in this action. The Count of Boulogne, who commanded the right wing of the allied army, fought with great obstinacy. At the commencement of the action he had drawn up a body of chosen infantry pikemen into a hollow battalion, two deep, in a circular formation, in the centre of which he took up his position. In the front of this circle, which bristled with pikes in every direction, an opening was made when he wished to charge. From time to time, as he became exhausted, he retreated to the circle, which gave him an entrance, and protected him from the hostile horsemen, while he took off his helmet, and recovered his breath.

The other incident is that of two bodies of hostile knights, or gendarmerie, while fighting against each other, stopping, as if by mutual consent, in the midst of the struggle, and all relieving themselves of their helmets to get fresh air, and to obtain rest.[1]

It could not take long, under these circumstances, for the infantry to begin again to hold their proper relative position, and the fact of the hollow circle of the Count of Boulogne successfully serving as a place of refuge to him from the attacks of the heavy cavalry, speaks volumes as to the steadiness and discipline of his chosen pikemen.

At this battle, also, we see that Philip Augustus had a body of infantry, somewhat of a regular character, called "*sergents d'armes.*" The infantry levies of the communes were also distinguished by the name of "*sergents.*" These troops were of a much better quality, and of a higher rank than the ordinary rabble that formed the foot-soldiers of the feudal armies, and were commanded by nobles. The name *serviens*, or *sergents*, is sometimes used to signify a bodyguard only, but is also often applied to the whole body of the soldiery under the rank of knight, but particularly all those who fought behind the knights in the second rank.

[1] Daniel, Milice Française, i. 214, 215.

CHAPTER VI

The Crusades

In the latter part of the eleventh century, after the institution of chivalry was firmly established, an immense movement took place in Europe, which affected the history of that continent and Asia for about two hundred and fifty years.

As already mentioned, religion soon became intimately connected with knighthood, and exercised an enormous influence over the members of it. At a period when religious superstition had unbounded sway over all classes, when military exploits were considered the only object of life among the nobility, and when the institution and spread of the order of chivalry had checked the petty feuds and wars between Christian states, Europe contained an inflammable mass of material, that the slightest spark would set in a blaze.

At this time Peter the Hermit, an enthusiast well fitted for the work, went through Christendom preaching in favour of a crusade, to deliver the Holy Sepulchre from the possession of the infidel. All Europe was soon ringing with the story of the wrongs and cruelties practised upon the pious Christian pilgrims, who in great numbers were continually visiting the Holy Land. Pope Urban II. at once took advantage of the opportunity, and used his influence to range the chivalry of all nations under the banner of the Church.

Fired by religious enthusiasm immense hordes collected, quarrels between the feudal lords and sovereigns ceased, while all united together to carry on a Holy War against the Moslem. The Crusades are the most striking and peculiar feature of the middle ages, and the records of them convey much instruction to the military reader, not so much on account of any influence that they exerted on the development of the art of war, as for the light thrown upon the method of warfare of the time.

The first crusaders were an undisciplined rabble, consisting of fanatics of the worst class, who did more injury to the

Christian nations through which they passed, than to the infidels they had sworn to conquer.[1] Without organisation, without a commissariat, without supplies, or the means of obtaining them, they first begged, then robbed and plundered, until they were set upon by the exasperated inhabitants of Hungary, and massacred in immense numbers.[2] A few only, under Walter the Penniless and Peter the Hermit, crossed the Bosphorus, when, quarrelling among themselves, they separated, and were destroyed in detail by the armies of the Sultan Solimaun.[3]

Other plundering bands started for the Holy Land, and committing worse outrages than their predecessors, were set upon and destroyed, without one ever reaching Palestine.[4] Then the chivalry came upon the scene, and the most skilful generals of the day stepped forward to lead and control the great movement of Christianity against infidelity, of Frank against Turk. Godfrey de Bouillon, Raymond of Toulouse, Robert of Normandy, and the Count of Flanders, as well as other nobles of great distinction, gathered around them the flower of the nobility of France and Italy, with some few of the Knights of England and Germany, and with an immense army undertook the first organised military crusade.

They marched by different roads, in order the easier to supply the troops with food on the way, timing their movements so as to concentrate at Constantinople. Their arrangements in this respect are in marked contrast to the ill-advised and wretched management of the rabble that had preceded them. In spite of this they had not learned the art of provisioning an army, nor had they the facilities for doing so with advantage.

Under the system of warfare in Europe in that age, the campaigns were of short duration, and armies subsisted almost entirely upon the country in which they fought,[5] and rarely had either convoys of supplies following them, or magazines established upon which to rely. When compelled to concentrate either for battle or to conduct a siege, the feudal armies constantly suffered from want of food, and the crusaders, after entering the enemy's country in Asia Minor, endured greater hardships, and lost far more lives by famine, than by the sword of the Saracen.

This crusade under Godfrey and the other leaders contained an immense number of cavalry and infantry. The historians of the day compute the army at 100,000 horse and 500,000 foot. The cavalry alone were of any value, the in-

[1] Michaud. [2] Mackay. [3] Ibid. ii. 19. [4] Ibid. 20.
[5] Hamley, Froissart.

fantry being a mere undisciplined rabble, unable to exercise any influence either in the open field or in the siege of fortified towns. The force was divided by nations, and each nation had its own quarters in camp. The knights wore the hauberk of chain armour, and a casque or helmet, and carried the lance, the sword, a poignard, a mace, and the bow and crossbow. The infantry used the sling, and long bucklers.

The Saracens fought principally on horseback, and used the bow with great effect. They pursued the Parthian system of tactics, avoiding a direct charge, but returning and pouring in fresh clouds of arrows, the moment the crusaders withdrew from the pursuit. The greater speed of their horses gave them a considerable advantage in their manœuvres, especially as the heat of the climate, and the weight of the armour of the Christians, rendered continued and violent exertion almost impossible.

The great distinction between the two hostile armies may be briefly summed up in the words "heavy" and "light." The Christian knights were emphatically heavy cavalry. They formed in solid line for the charge, and with their stout lances their onset was terrible, while in the hand-to-hand conflict, nothing could withstand the crushing blows of their ponderous swords, maces, and battle-axes. The Saracens were superb light cavalry, equipped for and accustomed to rapid manœuvres. They handled the keen cimeter with wonderful dexterity, and threw their javelins, or shot their arrows, with remarkable skill. Their armour, although of the same description of chain mail, had equal powers of resistance, but was lighter and more flexible, and much superior to the clumsy and weighty armour of the first crusaders.

This oriental chain mail was of excellent workmanship and beautifully adorned with gilding. The helmet, or headpiece (which was provided with a nasal which, prolonged above the crown, carried a plume on the crest) was light, and highly ornamented with gilding and damascene work in gold. The shield was small, round, and had a boss or point in the centre. The inferior soldiers were all archers. The Saracens soon adopted the lance.

They could not stand against the weighty and ponderous charge of the western knights, and at first were continually defeated, but in time they gained experience, and avoided the direct charge. More active and rapid in their movements, they rushed first upon one flank, then on the other, charging up and retreating, but ever ready to take advantage of any opening. Dexterous and brave horsemen, and perfect masters of the art of swordsmanship, the agile Saracens would cut

down the lances, parry their thrusts, and if a weak point could be found in their opponent's armour, drive home a deady blow, with their finely tempered blades.

Although the numbers of the crusaders were so great, the individual courage and training of the knights so high, and the moral enthusiasm of the whole mass so exalted, yet the results were not satisfactory, the success only partial and evanescent, and the losses and suffering endured terrible beyond description. The Crusades teach, more powerfully than any argument, the absolute necessity in war, of thorough organisation, strict discipline, and undivided command.

Chivalry had however so thoroughly taken possession of the people of Europe, that the knights, wrapped up in the pride of their connection with so distinguished an order, never gave any thought to the infantry service, or paid any attention to organise it, so as to make it of use in its peculiar sphere. The result was an army of heavy armed cavalry, unwieldy and cumbersome, composed of highly trained and brave soldiers, followed or accompanied by a confused mob, whose only use appears to have been to eat up the provisions that were so difficult to obtain, and to delay and embarrass the movements of the only soldiers in the army.

So thoroughly had the cavalry service usurped the functions of all the others, and so useless were the so-called infantry, that it became necessary for the knights to take upon themselves the duty of attacking and defending fortresses, of guiding and directing the works necessary in a siege, of constructing engines and towers for the purpose, and of working them when constructed.

Instead of organising bodies of pikemen and archers, instead of utilising the foot-soldiers, in forming them into garrisons for the defence of the fortresses and cities which they captured on their march, they weakened their effective force in the field, by making detachments of their heavy armed horsemen, and cooping them up to guard walled towns.

There is no service that requires less tactical skill, and less training, than that of defending a fortification, particularly in the middle ages, when artillery was not so perfected, or so scientific in its use, as at the present day, and the fact of the knights performing the duties themselves, shows how completely the idea prevailed that the cavalry alone were able or qualified to perform any service whatever.

At the siege of Nicea the whole Christian army camped about it, and employed all the machines known to the Romans; the Greeks, who were with the Crusaders, aiding and assisting them in the work. We find here the knights

and nobles dismounted, and engaged most actively in all the operations of the attack, the officers of the highest rank performing the same duties as the commonest soldier. They commenced by making many assaults, in which they were repulsed after useless displays of the most astonishing valour; and we see accounts of Raymond and Godfrey, the two most prominent leaders of the Christian host, fighting in the towers, and personally using crossbows and other projectile weapons. Mines were also used in the siege. Raymond, having undermined, and so destroyed one of the principal towers of the city,[1] caused such consternation that the place surrendered to the Greek emperor the following day, in order to be protected from the rapacity of the crusaders from the West.

The siege of Antioch is marked by the same peculiarities that were shown in the siege of Nicea, except that the Christians seemed to have relied upon a blockade, rather than upon direct operations. The knights were engaged continually in foraging for provisions, in defeating attempts to raise the siege, and to throw supplies into the city, and in driving back sorties which the garrison were continually making.

By this time they had discovered the want of an infantry force, and the uselessness of the vagabonds who were in their following. To rectify as much as possible this defect, they organised a military force that was very formidable to the Saracens. The beggars and stragglers that hung around the Christian army were employed in the labours of the siege, and were placed under the orders of an officer who was entitled the "*Roi truand*," or king of the vagrants.[2] They were paid out of the general treasury for their services, and when they were able to buy arms and clothes they were forced to enter one of the regular troops of the army. Embarrassing camp followers were thus made valuable auxiliaries.

Although Antioch was besieged seven months, the crusaders would have failed to take it, but for a piece of treachery on the part of one of the officers of the garrison named Phirous, who agreed to deliver up one of the towers in the wall to Bohemond, prince of Tarentum. When the time came for the treason to be consummated, the tower was scaled by sixty knights in armour, followed by large numbers of others also heavily armed, and most probably all dismounted cavalry. They seem also to have been armed with

[1] Michaud, i. 102. [2] Ibid. 145.

lances and swords in this affair, which was entirely successful, and secured to them the possession of the city.

In the siege of Jerusalem we see the same custom of the important duties being all performed by the knights. After their first ill-advised and enthusiastic attempt to storm the city they found it necessary to commence the operations with more deliberation, and to construct the requisite machines of war, by the use of which alone so strong a fortification could be reduced.

Here, again, the want of system in reference to the provisioning of the army caused the crusaders to endure cruel hardships, and to suffer serious losses. A Genoese fleet coming to Jaffa with large supplies of provisions and ammunition of all sorts, and accompanied by a great number of Genoese engineers and carpenters,[1] supplied two of the most urgent wants of the crusaders, and revived the spirits and courage of the army.

The knights and barons themselves became again laborious workmen in this siege, and worked energetically in the construction of the engines of war and the towers to be used in the attack. Three of these towers were built, which were higher than the walls of the city, and each of them had three stages, one for the workmen who directed its movements, and the two higher for the warriors or knights who were to fight from it, and assault the walls by means of a drawbridge which was constructed on each tower to give them easy access.

Missiles of all kinds were thrown from engines and by hand, while slingers and crossbowmen hurled their projectiles unceasingly against the ramparts. The three towers advanced simultaneously on three sides of the city, while parties of knights with scaling ladders attempted to assault by that method at different points. Godfrey took his place on the highest platform of his wooden fortress, accompanied by his brother Eustace and Baldwin du Bourg,[2] and, surrounded by knights, they sent showers of javelins into the city. The other leaders, Raymond, Tancred, the Duke of Normandy, and the Count of Flanders, all fought in the front ranks. After fighting without success for nearly two days, Godfrey's tower advanced near enough to have its drawbridge lowered, and then the knights, rushing in to close quarters, soon had possession of the walls, and drove the Saracens through the streets of the city. The crusaders, pouring in at every point in the fury of the assault, massacred without pity, and a fearful scene of carnage ensued that baffles all description.

[1] Michaud, i. 208, 211. [2] Ibid. 218, 219.

These accounts of the capture of Nicea, Antioch, and Jerusalem show that the knights were almost entirely relied upon for every species of military duty, and prove that the military art of the time was very defective, and such as entailed a great waste of available power.

Among the Saracens also the same exaltation of the cavalry service existed, and their armies were composed to a very great extent of mounted men. At the battle of Dorylœum in Phrygia, the army of Soliman is loosely computed at from 200,000 to 350,000 horsemen.[1] They were armed with the long Tartar bow, the crooked sabre, and the javelin. They did not fight in the direct charge, but by continual irregular evolutions, in which they kept up a constant volley of arrows. While the horses were fresh and the quivers full the Saracens had the advantage, but after a long and desperate struggle in which 4,000 Christians fell pierced by the Turkish arrows, a flank attack by Raymond of Toulouse turned the scale, and a brilliant victory to the crusaders was the result.

In the battle before Antioch, where the Saracens under Kerboga were attacked by the crusaders, the Turkish army is computed at 100,000 horse, and 300,000 foot,[2] some writers even going as high as 600,000 of all arms. The hardships of the siege of Antioch by the knights, the much more terrible suffering and famine of the Christians when themselves besieged, had so weakened their army, that of the 60,000 mailed horsemen who had proudly marched against Antioch, scarcely 200 were mounted and fit for battle. Godfrey de Bouillon, their great leader, was reduced to the necessity of borrowing a horse to ride into action.[3] The knights were therefore in this instance compelled to fight as infantry soldiers, but with the arms and weapons of horsemen. They marched in twelve divisions, and were attacked by the Turks, who discharged clouds of arrows, and rushed upon the crusaders, who met the attack with firmness, repulsed them, and penetrated their ranks.

The Saracens, who usually did not wear heavy armour, had in this action a body of 3,000 horse clothed in steel and armed with clubs.[4] This body was very efficient, and carried confusion and terror into the ranks of the Christians. After a closely contested fight, in which despair and a frenzied religious enthusiasm, worked up with considerable skill by their leaders, caused the crusaders to fight with the most extraordinary fury, they were at last victorious, and routed the Turks, captured their camp with its stores and supplies, and put to death about 100,000 of them.

[1] Gibbon, v. 577. [2] Michaud, i. 158. [3] Ibid. 172. [4] Ibid. 173.

Under Saladin the Saracen horsemen were both heavy and light, and he maintained a bodyguard of one thousand mamelukes, who were clad in armour, and wore over it saffron coloured silk tunics.[1] He himself wore the same dress. His cavalry were nearly all light horsemen, and were utterly unable to stand the direct attack of the crusaders, clad in mail, and led by the fiery Richard Cœur de Lion. In the actions between the chivalrous Saladin and the lion-hearted English monarch, the Saracens pursued closely the Parthian tactics that had been so disastrous to Crassus, but the crusaders, mainly cavalry, were armed with coats of mail strong enough to resist the arrows. Richard skilfully kept his army in closely serried ranks, and avoided the action, until when near Assur, he had drawn the Turkish hordes into a plain cooped up between mountains and a forest. Then he turned at bay, and charging at the head of his English nobles and the whole Christian host, he shattered the Saracen formation, and hewed his way through their thickest ranks. As far as the sweep of his heavy sword reached all went down before it or fled from it. The Turks, unable to get away, were cut down in great numbers, and although they fought desperately, they were completely defeated with immense loss.

Chivalry reached the zenith of its glory at this period, nor was there, in the long roll of great soldiers connected with it, a more gallant knight than the lion-hearted Richard.

A number of crusades took place from time to time, until in the year 1248 Louis IX. (St. Louis) of France led a large army to Egypt and landed near Damietta. The details of this landing are interesting. A number of the knights under Joinville, Baldwin of Rheims, and the Count of Jaffa, went ashore first and drew up in order of battle to cover the disembarkation of the remainder. The Saracen cavalry at once charged upon them to drive them into the sea. The tactics employed by the dismounted heavy cavalry to protect themselves were very judicious, and foreshadowed the coming revival of an infantry force armed as pikemen. They formed up in serried ranks, placed their bucklers upright in the sand before them, and resting their long lances on the top of their shields, presented an impenetrable array of steel points, before which the Moslem horse fell back in confusion.[2] The troops constantly landing from the fleet, formed under the protection of this battalion and effected the movement without loss or annoyance.

[1] James's Life of Richard I., ch. ii. 155, 156.
[2] Michaud, ii. 382; Mackay, ii. 93.

Although the Crusades lasted for over two hundred and fifty years, during which time all the nations of Europe furnished their contingents to the Christian armies, and although millions of treasure were expended and two millions of lives lost, yet we look in vain for any marked result upon the military art. Although the deficiencies in their system of war were clearly shown at every stage of the struggle, there was no systematic effort made to remedy them. It is one of the most curious features of the Crusades, that no great military reformer arose to rectify the errors and to reorganise the armies of the Cross so as to chain success to their banners. Never was the necessity for reform in the military forces more clearly manifested, never were armies taught their weak points by more direct and more bitter experience, never was there a better opening for a great genius to have effected extraordinary results. The required reorganiser did not appear, however, and nothing more strongly proves the absolute hold that chivalry had obtained in the minds of all classes.

Although the Crusades had proved so strikingly the inability of cavalry to act upon every description of ground, although they had shown so plainly that cavalry alone could not perform all the numerous and varied duties required of an army in the field and were not suited for every emergency of war, yet many years elapsed, and many campaigns were fought, before the infantry service regained its proper relative position in armies.

Before proceeding further in detailing the gradual revival of the infantry service, it will be in place here to say a few words with reference to the cavalry of other nations, not connected with either chivalry or the Crusades, but who cannot be altogether overlooked.

SECTION II.—CAVALRY OF RUSSIA AND POLAND DURING THE PERIOD OF THE CRUSADES.—INVASION OF THE MONGOLS, &C.

Ancient Sarmatia was but little known to the Greeks and Romans, and fabulous stories of countries where continued night existed, and other legends of like value, are the only references we find in early history to that portion of Europe.[1] Later on we obtain scanty details of information as to the wandering tribes that moved about the great plains of that country. The emigration, union, and dissolution of these tribes, form a continually shifting picture, that renders it

[1] Karamsin, i. 2, 3.

exceedingly difficult to give more than a loose and indefinite idea of the different changes in the population, government, and manners of the early inhabitants.

We have already referred to the cavalry of Scythia in remote times, and we are able to obtain from Ammianus Marcellinus some information as to the Sarmatian horsemen in the fourth century of the Christian era.[1] The strength of their armies was mainly composed of cavalry, and they had the habit of leading one or two spare horses on the march in order to have a fresh mount at hand so as to ensure great speed and greater endurance. This gave them facilities for a rapid advance or retreat, which often surprised their enemies.

They invented and made use of a cuirass of scale armour. The scales were made of slices of horses' hoofs sewed on linen, and were capable of resisting the sword or javelin. The Sarmatians carried a long lance, a powerful bow with a quiver of arrows, and a short dagger. The scarcity of iron compelled them to point their weapons with fish-bones, and to make them more deadly the points were poisoned.

The Norman sea-kings, who carried their conquests over many parts of Europe, and who were seen victorious in France, in Naples, Sicily, and Apulia, had spread from the shores of the Baltic into Russia; and Rurik, a Norman or Varangian prince, founded the Slavonian or Russian monarchy in the year 862.

In 906 Oleg, the Regent of the monarchy during the minority of Igor the son of Rurik, declared war against the Greek Empire. A number of the native tribes ranged themselves under his banner, along with the Varegues or Normans, and the army set out, the infantry by the river Dnieper in 2,000 small boats, the cavalry marching along its banks.

In this we see the influence of the Norman character, for the sea was their native element. Their expeditions from their own country being all made by water gave them the title of the Sea Kings. They therefore sailed down the river, carrying their boats and supplies by land around the cataracts in the same manner as was adopted by General Wolseley in the Red River Expedition of 1870 in Canada, where 1,200 soldiers and nearly as many voyageurs, or boatmen, went by water and land a distance of over 600 miles, carrying supplies for three months, and being obliged to convey by main strength all their boats and baggage over forty-seven different portages.[2] The desert country through which General Wolseley marched having no roads of any description, and covered as it was with the original forest,

[1] Ammianus Marcellinus, xvii. 12. [2] Huysshe, Red River Expedition.

rendered it absolutely necessary for him to go by water. The same causes may have rendered the river the easiest route for Oleg to follow, and may have been the reason of its being adopted.

The historian is silent as to whether the cavalry were allowed peaceably to march through Bulgaria to Constantinople, but it is probable that they followed the coast of the Black Sea, and were in the neighbourhood of Constantinople during the time that Oleg was besieging it; for it is stated that the country all around the city was ravaged and burnt, and this was likely to be the work of the cavalry. The Greeks bought a peace with money, and no pitched battle was fought.

Oleg is said to have made a second expedition against Constantinople, but the silence of the Greek historians renders its occurrence very doubtful. In 941 Igor made a descent upon the Eastern Empire, but was defeated with heavy loss, through the means of the terrible Greek fire which was poured upon his troops from numberless tubes and engines of destruction.[1] In 943, with a powerful army, of both infantry and cavalry, Igor made another expedition against the Greeks, but the emperor again bought a peace by presents, and by numerous concessions.[2]

In 1043 Yaroslaf, great-grandson of Igor, made another expedition against Constantinople, which was also unsuccessful, partly through a storm, and partly through the use of Greek fire by his opponents.

The Normans had improved the military art among the Sclavonians or Russians. They formerly fought in irregular groups, as the ancient Scythians, but under Norman influence tactical divisions were made, and columns were ranged in order, with flags or standards to each body. Trumpets were used to give signals for movements, and to encourage them in the advance. Their attacks were made in battalions with serried ranks. They had an efficient force of cavalry, partly composed of foreign mercenaries, and partly of natives of the country. The use of advanced guards to cover the march of the army was well understood and regularly adopted, so that their armies moved secure from surprise.[3] The troops were constantly drilled and exercised in the open field, both in sham fights and in the regular manœuvres required in battle.

The defensive arms in use among the Russians at this epoch were cuirasses, arm-pieces, or brassards, and large helmets. A lance or pike, bows and arrows, and a two-edged

[1] Gibbon, v. 430. [2] Karamsin, i 184. [3] Ibid. 298.

sword, were the offensive weapons. The tactical divisions were each one thousand strong, under the command of an officer called "Tissiatchsky."[1] These battalions were subdivided into ten companies of one hundred each, commanded by *centeniers*, which were also divided into ten sections of ten men each, commanded by "deciatsky."[1] A special corps of chosen men formed the guard of the prince, and were charged to defend his life, and set an example of valour to the rest of the army. The prince commanded the whole army, and under him, but over the "Tissiatchsky," were the "voiêvodes," who commanded the brigades or divisions. The Varegues formed a separate corps, and in addition to the right, which belonged to all the troops, of a share in the booty, they were accustomed to receive a regular pay.[2]

The archers generally commenced the action. The soldiers did not put on the cuirass until the moment they were going into action, for, to relieve the men, the armour was carried upon chariots. The enemy often profited by this circumstance to fall upon them while unarmed.

The Polish army for many centuries consisted mainly of cavalry, in which service they excelled. The old system of allodial tenure was maintained in Poland for many centuries after it had lapsed into the feudal system in the other parts of Europe. The nation, until modern times, consisted of a great body of free landholders, or nobles, who preserved inviolate the right to assemble in person and discuss public affairs. These nobles, who, clad in furs and magnificently armed, appeared mounted on horseback in the assemblies, formed the legislature of the nation in peace, and its army in war. Their sovereign was elected by the free choice of the allodial proprietors, and so impatient were they of restraint, and so highly did they value the rights of freemen, that all decisions were required to be unanimous. These proud horsemen looked upon trade and commerce as degrading, and the pursuit of arms as the only occupation fit for a gentleman.[3] Their love for equality was so strong, that hereditary offices were unknown among them, every position or station of eminence being held only for life.[4]

The arms of the Polish nobility were ornamented to the highest degree. They used poignards and cimeters set with brilliants, bucklers of costly workmanship, battle-axes enriched with silver and decorated with emeralds or sapphires, and bows and arrows. The horses were often clad in iron, and each knight wore a splendid signet-ring, which, in

[1] Karamsin, i. 299. [2] Ibid. 300. [3] Salvandy, i. 72.
[4] Ibid. 71; Alison, i. 351.

imitation of the Roman *equites*, was the badge of his rank as a member of the equestrian order.[1]

The army was divided into different parts: the national troops, a small body of regular soldiers equipped and paid by the Republic, the pospolite or general assembly of all the free citizens or nobles on horseback, the armed valets, and the mercenaries who were generally Germans.[2] Nearly all these bodies fought on horseback. The heavy cavalry in particular constituted the main strength of the army. It was divided into cuirassiers and hussars, and they were all included under the term "Towarzirz,"[3] or "companions," as they were all of equal rank to each other, and to the king, who was only *primus inter pares* and accustomed to address them by the term companions.[4] The cuirassiers were clad in cuirasses and helmets of steel, and carried the lance, the sabre, and the bow. The horses were also provided with defensive armour. The hussars wore a hauberk, and depended mainly upon the sabre.[5] At a later period these horsemen carried two sabres, one slung on the side of the rider, the other under his left thigh fastened to the saddle. Both were distinguished by the splendour of their equipment, and the number and quality of the mounted servants who followed them into action. Furs and the skins of beasts were much used in their dress.[6]

They seem to have fought in action in the middle ages somewhat in the same way as the knights of chivalry, the nobles or Towarzirz fighting in the front rank, and their servants or attendants forming in rear to aid and assist them.[7] Afterwards the Polish hussars were formed up in squadrons, of 100 hussars in the front rank, with four ranks in rear composed of the four servants of each hussar. These servants were lightly armed horsemen. The hussars according to Zeddler carried lances nineteen feet long with a coloured pennon.[8]

At a very early period we read in Russian history of bands of soldiers called Drujina or Droojins. They seem to have been a sort of guard or retinue, formed of the ruling class, which was always maintained by the Russian princes. They occupied a very honourable position, being a nobility or sort of council in time of peace, and a *corps d'elite* in time of war. The Drujina at first were composed exclusively of the Varegues, but after a time they were increased by the introduction into their ranks of those of the natives who were most distin-

[1] Salvandy, i. 352; Salvandy, ii. 195. [2] Alison, i. 353; Salvandy, ii. 125, 126.
[3] Ibid. 128. [4] Ibid. 129; Coyer's Hist. de Sobieski, i. 62.
[5] Ibid. 64. [6] Alison, i. 353. [7] Bardin, 3538. [8] Zeddler, ii. 285.

guished for strength and bravery. They afterwards were divided into two classes, the first consisting only of Boyars or nobles, the second of all classes, and this last formed afterwards the Dwor, from which comes Dwarane, or possessors of serfs. These Drujina were peculiar to Russia, not being found elsewhere in Europe. The members of the Drujina remained always attached to their prince, the attachment being of a personal character, for they seem to have had little sympathy either with the country they came from, or that in which they resided. This was caused by the feeble economical development of the different peoples that formed the Russian nation, there being nothing to tempt them to secure land or settle permanently upon it. The support of these bands was guaranteed by military requisitions, and by the property of the prince. About the end of the twelfth century the princes became settled, and the Drujina obtained the right to hold land. To aid the Drujina in war the princes often hired the Varegues, the Petchinage, and the Torkye. They were all cavalry.[1]

In the early part of the thirteenth century a terrible irruption of Mongolian horsemen, under the leadership of the sons of Gengis Khan, swept over Russia and the eastern portions of Europe, devastating and destroying everything before them. They had already swept over almost the whole of Asia. China had suffered under their cruel invasions. From the Pacific to the shores of the Black Sea these hordes of Tartar horsemen had overturned monarchies and conquered and despoiled the inhabitants.

Gengis Khan had established a military system that proved the great ability of that celebrated commander. His army, consisting entirely of cavalry armed with bows, cimeters, and iron maces, was divided by hundreds, thousands, and tens of thousands, under their respective commanders. The numbers in his armies were almost fabulous, and are no doubt greatly exaggerated. The battles of Europe seem but petty skirmishes when compared to the conflicts that have taken place on the plains of Asia.[2] Seven hundred thousand Mongols are said to have fought under Gengis and his four sons, against 400,000 of the army of Mohammed, Sultan of Carizime, who reigned over a territory extending from the Persian Gulf to the borders of India and Turkestan. In the battle which took place between them on the plains north of the Jaxartes, 150,000 Carizmians were slain.

After the death of Gengis, his son Octai, having subverted the Northern Empire of China, decided to invade the

[1] Goudim Leffcovitch, 5. [2] Gibbon, vi. 210.

most remote countries of the West. The roll of his military force contained the names of 1,500,000 fighting men. He placed 500,000 of these under his nephew Batou, or Peta, and sent him in 1235 towards the setting sun.[1] In six years this enormous horde had marched one-fourth part of the circumference of the globe. They were followed by immense trains of waggons, conveying their baggage and artillery, and by great herds of cattle. They crossed the rivers on the ice, or by swimming, or in leathern boats, which were used for transporting their waggons and artillery. Their families accompanied them, and lived in tents which were carried in the rear. The soldiers fought mainly with arrows, avoiding the close struggle, and striving to destroy their enemies from afar with projectile weapons.[2] The Khans and principal chiefs took post in the rear, and directed the movements of their men by means of different prescribed signals.

Their arrows were long and sharp, they carried enormous cimeters, lances provided with hooks, and bucklers of willow or osier. The produce of the chase, and the flesh of their flocks, formed the principal food of the Tartars. In summer they moved northwards, encamping in the neighbourhood of rivers or lakes. In the winter they migrated southwards in search of warmer climes, and among the mountains sheltered themselves against the icy winds of the north.[3]

These tribes assembled in immense numbers every year. These gatherings, called *Couraltai*, were always held on horseback, where the warriors consulted, and deliberated upon the distribution of pasturage, and their movements in peace or war.[4] These assemblies formed the sole legislative power of the people, and framed the laws, which, from their primitive habits, were of the simplest character. The entire population was military, their noblest occupation being war, their strongest sentiment the love of glory. Their encampments in peace, even their hunting parties, resembled warlike exhibitions.[5] They were most skilful horsemen, ever in the saddle, where they often ate and slept without dismounting. Their bow was of great size and extensive range, and their arrows struck with terrible force.

In rapidity of movement, in dexterity, in quickness of evolution, they surpassed all nations. They were never more dangerous than when apparently defeated, for their perfidious retreat was often more injurious than the boldest and most gallant charge. In stratagems they excelled, while their cruelty was without limit. Ignorant of the art of defending

[1] Gibbon, vi. 217. [2] Karamsin, iv. 19. [3] Michaud, ii. 313.
[4] Ibid. [5] Ibid. 315.

towns or of fortifying cities, they yet understood how to construct the most formidable machines of war, and how to conduct skilfully the most intricate operations of a siege. Their garments were of the simplest form, and the skins of their herds furnished a warm and durable material. Their wandering life rendered them experienced in all the difficulties of the march, and neither the height of mountains, the width of rivers, or the steepness of precipices ever found them without resource, or ever impeded them in their movements[1]

Their discipline was strict and the obedience to their leaders perfect, and although moving in such immense hordes, the order and regularity of their movements impressed their enemies as much as their courage and cruelty struck them with terror. They never made peace but with a conquered enemy,[2] and he who fled from battle or abandoned his comrades in danger was punished with death.

The approach of the first Mongolian horde was heralded by the arrival in the Principality of Kiev of large numbers of the Polovtsi, who on the advance of the Tartar horsemen fled with their wives, their cattle, and their valuables. The Russians under their princes gathered a large army on the banks of the Dnieper, and in the first skirmish were completely victorious over a detachment of the enemy. This success is attributed to the great skill and bravery displayed by the Russian archers in the action.

Elated by this victory the Russians crossed the river and marched towards the enemy.[3] At the end of nine days the two armies met on the Kalka or Kaletz, near Marioupole, in the government of Ekaterinoslaf, and on the 31st May, 1223, a decisive battle took place, which resulted in a complete victory for the Mongols, caused partly by the treachery of the Polovtsi refugees, who deserted in the action, and slew their Russian allies for the sake of plundering their horses and arms, and partly by the great number and extraordinary skill and activity of the Tartar cavalry. The Tartar historians say that the Mongols drew the Russians by design, some distance into an open desert, where they would be fully exposed to the attacks of the mounted archers and swordsmen, and where they would be obliged to fight for several consecutive days.[4] Russia had never suffered such a frightful disaster. The invaders pursued their success with great vigour, and so great was the loss of the fugitives, that a superb army, numerous and full of valour, vanished like a shadow, one tenth part only escaping.[5]

[1] Michaud, ii. 315. [2] Ibid. [3] Karamsin, iii. 288, 289.
[4] Ibid. 291. [5] Ibid. 289.

After this victory the Mongols disappeared for some years, until in 1237 they again approached under the command of Bati, the nephew of Octai, and having defeated Youri, Prince of Rezan, and captured the city, they won a victory over Vsevolod, at Kalomna, burnt Moscow, and put the inhabitants to the sword.

Vladimir, Gorodetz, Galitch, Rostof, and many other cities were soon destroyed, the inhabitants being put to death or dragged away into slavery; and at last, in 1240, after desperate struggles and brilliant displays of unavailing valour, the splendid city of Kief was stormed by the barbarians and destroyed, and this ancient place, this illustrious capital, the mother of Russian cities, disappeared for ever, and it was long ere a new city arose upon the site.[1]

After the conquest of Russia, Bati led the multitude of Mongols in victorious career towards Poland and Germany, ravaging and destroying everything in the line of his march. The horrors of the barbarian invasions were again repeated upon the plains of central Europe. The cities of Lublin, Warsaw, and Cracow were destroyed, and from the Carpathian mountains to the shores of the Baltic, the plains were cut up by the tramp of the Tartar horsemen, while burnt villages and devastated fields marked their passage.[2] The Duke of Silesia, the Polish Palatines, and the Grand Master of the Teutonic order, united in vain to arrest the progress of the destructive torrent. The great battle took place on the plains of Lignitz, near Wahlstall, on the 9th April, 1241.[3]

The Polish army was composed principally of cavalry, all heavily equipped, and partly clad in armour. They seem to have been drilled to fight, as cavalry should fight against cavalry, by the force of the charge. The example and teachings of Henry the Fowler, and the victories won by him and his son Otho, at Merseberg and Augsburg, against an enemy who pursued the same tactics as the Mongolians, could not have been forgotten although 300 years had elapsed. Prince Henry the Good and Mizeslav, Prince of Upper Silesia, commanded the Polish army. They drew it up in five corps, very skilfully keeping some in reserve, for they seem on both sides to have appreciated the value of the last reserves in a cavalry action.

The battle was opened by a vigorous attack upon the left wing of the Mongols by the right wing of the Christian army. This attack was at once successful; the lightly armed and lightly equipped Mongols, being no match in the direct charge for the heavy armed Polish horsemen.[4] The Tartars

[1] Karamsin, iv. 13. [2] Michaud, ii. 323. [3] Ibid. [4] Nolan, 13.

retreated for a while, and when the force of the charge was spent, rallied and drove back the Poles upon their reserves. These then charged in their turn, overthrew the barbarians and pursued them. Suddenly, according to the Polish historians, "a spell, the effect of enchantment, began to work," and their countrymen fled. This spell was simply the result of the unexpected rallying of the Mongols, of the unaccustomed tactics of a retreating foe, that were more dangerous flying than charging. The novelty of the system of tactics, the confusion unavoidable after a successful charge, and the attack of fresh reserves, all formed a spell which was quite sufficient to turn the scale and send the unwieldy horsemen of the West back upon their lines.[1]

Prince Henry, evidently a skilful general, had still a force in reserve which he led in person to restore the fortune of the day. The Mongolian leader, Bati, advanced to meet him, but unable to withstand the direct onset, evaded it, and returned again and again to the charge. At last, when all the corps of the Christian army had been exhausted in pursuing and charging their light and intangible opponents, Bati, with a last reserve, poured down and swept the wearied remains of the Polish army from the field.

Such was the great battle which checked the Tartar invasion of the West, for, although victorious, the invaders had met an opposition more desperate than they had yet encountered, and instead of pursuing their conquests further in that direction, they turned to the south, crossed the Carpathian mountains, and ravaged the plains of Hungary. In their movements in that country we do not obtain any details of interest in reference to the question we are discussing.

[1] Nolan, 14.

CHAPTER VII.

DECLINE OF FEUDALISM AND INTRODUCTION OF FIRST REGULAR CAVALRY, 1290—1445.

SECTION I.—RESULTS OF THE CRUSADES.

IT has been observed by some superficial writers that the Crusades did not influence the military art in any marked degree; but although these great expeditions did not immediately produce striking alterations in the manner of conducting war, yet they indirectly caused great changes in the social, political, and military systems of Europe.

The Crusades struck a serious blow at feudalism. The nature of the feudal tenure, particularly suited to the petty quarrels between neighbouring lords or small states, was not adapted to the wars between great kingdoms. The term of service which the vassal owed his chief was generally forty days only, and sometimes even less. Armies gathered under such a system could burn an open town, or make a plundering raid, but could not undertake a protracted siege, or enter into a lengthened campaign.[1]

This weakened the power of the monarchs, and rendered extensive conquests by them impossible. It caused them also to be dependent to a great extent upon their powerful vassals, who for a long period exercised a preponderating influence. The petty quarrels and continual conflicts in the early days of feudalism caused the tie between the lord and his vassal to be of the closest character and mutually advantageous. Afterwards, when private wars ceased, and the authority of the kings became paramount, the tenants felt keenly the burden of their tenure, and no longer required the protection of the chief, which formerly had been so valuable a privilege.

The rise of chivalry, as we have seen, tended to prevent these petty struggles, and the Crusades closely following the institution of the order, gave a vent to the warlike feelings of

[1] Hallam's Middle Ages, i. 260.

the age, and combined all Christian nations against a common enemy. The great nobles, who led their vassals to the Holy Land, were not followed through any obligation arising out of the feudal tenure. They were simply the chiefs of bands of volunteers or adventurers,[1] and the richer knights equipped and maintained those of their followers who were too poor to support themselves. The expenses incurred in these expeditions impoverished the noble families, and ruined many of them, compelling them to sell their estates, either to provide means to equip their soldiers before setting out, or to repay debts incurred while abroad.

The Crusades lasted two hundred and fifty years, and during that period it is manifest that the feudal principle could not fail to be impaired by a state of affairs so hostile to its existence. The lower classes were gradually elevated, in proportion as the powerful families lost wealth and influence, and the monarchical principle, gaining in strength, consolidated itself.

The cities, increasing in population and wealth, soon began to feel their strength in the embarrassments and needs of the nobles.[2] They soon obtained great liberties by gradual encroachments, and by concessions purchased at high price from their impoverished feudal chiefs. Charters were granted, by both the king and the barons, to many of these communities, and by the end of the thirteenth century the custom had prevailed all over France. The cities of Italy had gained their liberties at an earlier period.

The kings, to secure in their favour the influence of the cities against the great barons, in the disputes which continually arose between the crown and the nobles, took these free communities under their protection,[3] and guaranteed them against the encroachments of the feudal chiefs. Philip Augustus granted letters of safe-guard to communities dependent upon barons, while in the next reign Louis VIII. pretended to the immediate sovereignty over all chartered towns, in exclusion of their original lords.

The security of these cities and the freedom enjoyed by the inhabitants caused numbers to avail themselves of the great inducements held out, and to become citizens. The population was swelled in this way until the free cities became exceedingly powerful, and began to raise armies, and to make separate alliances with foreign states.

Although these changes were more of a political than of a military character, they yet had a most important influence

[1] Bardin, 1751. [2] Hallam, i. 255. [3] Ibid. 258.

upon the art of war, and for a time affected very materially the relative values of the infantry and cavalry services.

We have seen that the Crusades had a tendency to weaken the feudal principle, and to accustom the minds of all classes to a voluntary stipendiary service, in place of one of absolute obligation. The circumstances of the Crusades rendered this inevitable. The increasing power of the crown also enabled the kings to establish a mercenary in place of a feudal army. This they did very willingly, for they naturally preferred the obedience and discipline of the one to the insubordination and freedom of the other.

The wars of England, in Normandy and other parts of France, under Henry II. and Richard I., could not be carried on by troops gathered for forty days under the feudal system. The custom therefore soon arose of retaining the troops over the stipulated time by the allowance of a certain rate of pay. This was soon followed by the tenant buying relief from service with money, which the king employed to pay those willing to serve.

The cities also raising large bodies of troops found that they could not furnish as many horsemen as could be supplied by the ancient system, when military service was connected almost altogether with the possession and culture of land. They consequently raised large numbers of infantry, who, unlike the rabble which followed the feudal armies, were free artizans and mechanics, who had rights and property to defend.

When the infantry came to be organised from among the better classes, the first step was made towards the revival of that arm. During the palmy days of chivalry the infantry were not only composed of serfs of the lowest character, but there must have been great difficulty in providing leaders for them, when all soldiers of any pretensions fought in the cavalry, and considered the infantry service as degrading to the rank of a gentleman. They were therefore neither drilled nor organised to be of any service whatever, but were an undisciplined mob, neglected, and without leaders.

It can therefore be easily understood that when the free-born citizens of the chartered cities organised for their own defence, attention was bestowed upon the armament and discipline of the force, and more reliable foot-soldiers began to appear upon the battle-fields of Europe.

About this time, however, changes began to be made in the armour of the knights and men-at-arms which tended to retain the superiority of the cavalry over the infantry. The weapons of offence for a time had to a certain extent overmatched the art of defence. The chain-mail, it was found,

was often broken or torn by the lance thrust, and even if it held firm, the wearer was badly injured and bruised by the blow. The mail was also a very imperfect defence against the downright stroke of mace or battle-axe, and archery was becoming so improved, and cross-bows so powerful, that chain-mail was found to be but an inefficient protection.

This led to many changes in armour. Plates were first applied to defend the most exposed portions of the body, and were first worn over the chain-mail. Arm and thigh pieces, knee, elbow, and shoulder guards, were soon added, and during a great portion of the fourteenth century mixed armour of this kind was generally used, the plate additions increasing from time to time, until about the end of that century complete plate armour came into use, the mail being generally given up, although instances are recorded of its being used under the heavy armour as late as the sixteenth century.[1]

From the time of the introduction of plate armour, the means of defence were superior to the arts of destruction, until some time after the invention of gunpowder, when fire-arms were sufficiently improved to render defensive armour useless. During the early use of this heavy armour, cavalry again became for a time the all-important arm, and retained its high position for a considerable period.

Having touched upon the political and social causes which affected the military systems about the end of the Crusades, it will be in place here to consider closely the tactical and technical reasons, which also had their share in the revival of the art of war, and the re-introduction of the infantry as an important portion of armies.

The knights and generals who had fought in the Holy Land had it forced upon them, in campaign after campaign, that there were many emergencies in war where a well-organised and well-drilled force of infantry would have been much more available than the armed knights, and much less costly to maintain. Many of the knights also lost their horses in the East, and were obliged to fight on foot, and they must soon have learned that a mounted force was of little use for defensive purposes. The landing of the army of St. Louis at Damietta, where the knights dismounted and received the charge of the Moslem horse with firm array, and with levelled lances, also proves the dawning of the idea of an infantry force of pikemen.

The military art was not studied, however, as a science, and the prejudices of chivalry were so deeply rooted that men

[1] Boutell, 113.

eager for distinction still fought in the ranks of knighthood, and maintained the principles of the order, and its method of fighting, far into the sixteenth century, and long after the invention of gunpowder should have exerted a great influence upon it.

The cost of maintaining a knight, however, was very great, including, as it did, his esquire and followers, and it can be readily understood that when mercenary armies became the mainstay of monarchies, efforts would be made to utilise an infantry force that could be easily raised, and could be maintained at a cost far below what would be required to secure the service of knights and men-at-arms.

The cities of Italy were probably the first in the middle ages to raise armies and hire foreign troops. This was done by Pavia and Milan as far back as 1057.[1] Milan, before the middle of the twelfth century, had a very great population, far beyond that of the capitals of the great kingdoms. The city was strongly fortified, and the industrious citizens were free from the attacks of armed pillagers and the oppression of feudal tyrants. The artizans had the right to bear arms in their own defence, and the military organisation was based upon the division of the people into trades, who marched under their distinctive banners. Milan, in 1288, had in her army 8,000 gentlemen, or heavy cavalry, and 240,000 men capable of bearing arms, while her territory did not exceed probably 600 or 700 square miles.[2]

The power of the cities of Germany at this time was also very great. The citizens emulated the knights in skill and bravery, and far surpassed them in military knowledge, fighting in serried ranks and with better order.[3]

Although the infantry of these cities, both in Germany, France, and Italy, were much better than the foot-soldiers of the feudal armies, they were not as yet able to meet the men-at-arms of the age with any chance of success. The plate armour, which had replaced the coat of mail that had been the principal defence in the early Crusades, was impervious to the blows of either spear, javelin, or arrow, so that the heavy armed cuirassiers who were generally in use in the armies of the latter part of the thirteenth, and during the beginning of the fourteenth century, were invulnerable to the attacks of the militia levies of the cities.

Many contests took place in the various revolutions in the Italian cities, between the men-at-arms and the artizans and lower classes of the people. The weight of armour rendered the horsemen unwieldy, and unless they took possession of the

[1] Hallam, Middle Ages, i. 368. [2] Hallam, i. 392. [3] Menzel, ch. 180.

streets by surprise, the populace could easily erect barricades, and defy any number of the heavily armed lancers. If, however, a prince or usurper could attack by surprise, he, as it was called, "rode the city," that is, charged with his cavalry through the streets, so as to prevent the people erecting barricades.[1] This expression is continually used by the historians of the fourteenth century, and gives an idea of the relative merits of the services at the time.

The tactical formation of the troops of the chartered cities was very simple in its character, and yet judicious, inasmuch as the organisation was always complete. The different trades or guilds formed the tactical divisions, and each had its own banner, and a captain to lead it in the field. Eribert, Archbishop of Milan in 1039, invented a standard called the Carroccio, which formed a common rallying point, the pivot of every movement. It was a chariot or waggon painted with vermilion, and bearing the city standard elevated upon it.[2] This was intended to give a sort of concentration to the army, and supplied in a rude way the want of more regular tactics. For some time the militia was mainly composed of infantry, the proportion varying from six or ten to one.

In time, as the burden of turning out for war began to press heavily upon the industrious citizens, and as they increased in numbers and wealth, the employment of mercenary troops from abroad increased, and armies gradually became less numerous, and the proportion of heavy armed cuirassiers to the infantry much greater. This was caused partly because the plate armour gave the horsemen an immense advantage over the lighter armed infantry, and rendered them almost invulnerable, but the principal reason seems to have been the improvement in the tactics of the men-at-arms, which necessarily resulted when the mercenaries were organised in bands, and permanently maintained under drill and discipline.

These bands of free lances, composed of adventurers whose sole occupation was that of war, and who were continually kept under a certain degree of discipline, must have manœuvred in the field and charged in action, with much greater order and unity of direction, than did the confused tumultuous mob of feudal knights, who fought in the desultory conflicts of the preceding centuries.

SECTION II.—MERCENARY COMPANIES.

Mercenary troops were substituted for the feudal militia, or used as auxiliaries to it, long before the custom arose of

[1] Hallam, i. 428. [2] Ibid. 466.

employing bands of professional soldiers, who hired out their services to the highest bidder. At first it was usual, as already mentioned, to pay the tenants for services extending beyond the number of days which were fixed as an absolute obligation.

At a very early period, both in the English, French, German, and Italian armies, the payment of troops for their services was the constant habit. Canute the Great had paid soldiers in his guard in the early part of the eleventh century. Harold II. is also said to have had Danish soldiers in his pay. William the Conqueror's army, with which he conquered England, was a peculiar example of a mercenary army based upon the feudal principle. It consisted of 60,000 men, partly paid by regular pay, partly his own feudal tenants, and partly gathered by the promise of a fair distribution of booty in case of success. After the victory at Hastings, England was parcelled out into fiefs, and a great portion of it granted to the soldiers of his army. He afterwards employed hired troops, as did his son William Rufus.

In the wars of Henry II. of England and Philip Augustus of France, hired troops formed a considerable portion of the armies. Each of these monarchs had large bodies of mercenaries in his pay, recruited, as is believed from the name Brabancons, from Brabant or the Netherlands. These troops, which were always disbanded at the close of a war, abandoned their military duties with regret, and, unfit for the useful occupations of peace, gathered in lawless companies and oppressed and pillaged the peasantry without pity.[1]

Père Daniel says that in the time of Philip the Bold all feudal tenants received pay from the king, even during the term of their stipulated service. This must have been occasioned by the poverty of the tenants, which rendered them unable to defray the expenses, particularly in distant expeditions.[2]

The mercenary troops of the time of Louis the Younger and Philip Augustus were soldiers in war and bandits in peace. One of the first expeditions of Philip was against these brigands, whom he defeated in the Province of Berri and slew 7,000 of them. Their numbers must have been very great, for we see a few years later large bodies of them in his pay, as well as in that of King John of England.

The chief of the Brabancons in the pay of Philip Augustus was named Cadoc, and it will give some idea of the large force which he commanded under the king when it is stated

[1] Hallam, i. 263. [2] Daniel, i. 63.

that the daily pay received by them was 1,000 livres a day, which was an immense sum in that age.[1]

Richard Cœur de Lion, in his last war with France, had large bodies of Brabancons in his service under a famous leader named Marchader or Merchades; but it was during the wars of Edward III. with France, that the organised mercenaries began to occupy so important a position in the military systems of Europe.[2] Edward's whole army in his French wars was under pay, contracts being usually made with men of rank and influence, who raised and commanded corps and received a daily pay for each soldier furnished by them. The wages were very high, which leads to the inference that the private lancers, and even the archers, must have been recruited among the middle classes, the smaller gentry, or the rich yeomanry of England.[3]

The rate of pay in 1346 was—for an earl, 6*s.* 8*d.* a day; for barons and bannerets, 4*s.*; for knights, 2*s.*; for squires, 1*s.*; for archers and light cavalry, 6*d.*; for foot archers, 3*d.*; for Welsh infantrymen, 2*d.* These sums multiplied by about twenty-five, will give an idea of the relative amounts at the present value of money, and will show how high the rate of pay was.[4]

This high pay procured good soldiers of the better classes, and being national troops mainly, they were more reliable than the foreign mercenaries which were used to a great extent in Europe. At the battle of Crecy, Philip of France had in his army 15,000 Genoese crossbowmen who were mercenary troops. The remainder of his infantry were simply feudal militia of the most undisciplined character.

By this time it had become the common practice for soldiers of fortune to enrol themselves under the orders of favourite captains, and hire their services in organised bodies to whoever were willing to pay for them. These companies were much more employed by the free cities and republics of Italy, and exercised a much greater influence on the history of that country than of any other, although for a time they were very troublesome in France and Germany. They were known by the titles of Brabancons, Cotereaux, Routiers, and in Italy the chiefs of the bands were called Condottieri, which name was sometimes used to designate the companies as well. It was an evil hour for both the people and the sovereigns when the loyal feudal militia was replaced by these gangs of mutinous hirelings, generally foreigners, whose conduct in action, though often brave and soldierlike, inadequately

[1] Daniel, i. 105. [2] James's Life of Richard, ii. 445. [3] Hallam, i. 265.
[4] Ibid. note.

redeemed their misconduct in peace, and their vexatious and violent rapacity.

The great movement made by the provinces of France after the battle of Poitiers to rescue the monarchy from English oppression was based upon a system of mercenary soldiers. The cities and provinces levied taxes to pay the troops. Languedoc alone maintained 10,000 men, 5,000 of them being heavy men-at-arms, 1,000 *sergents-à-cheval*, and 4,000 cross-bowmen and pavoissiers. It is remarkable that in granting these supplies and raising these troops the citizens stipulated for the right to enrol in the bodies of cavalry, in which nobles alone had previously been admitted; so that after that period armies consisted of the noble, the middle, and the plebeian classes.[1]

The free companies of adventurers were composed of the poorer nobles and knights who had no patrimony and no profession open to them save that of arms.[2] They were generally all mounted, and consisted of knights, esquires, and archers. These bands do not appear to have been much employed in England, although they were continually used in the armies of the English kings while at war on the Continent, consequently England did not suffer in peace from the ravages of the disbanded mercenaries.

In France, however, in the midst of peace, the great companies kept together, and levied contributions as if on a conquered country.[3] They were the worst kind of bandits, murder, robbery, and destruction marking their progress at every step. Many attempts were made to destroy or scatter them.

It was in Italy, however, that the great companies assumed the largest proportions, and exerted the most important influence upon the history of the country. They were chiefly composed of Germans, and were quite indifferent to the cause for which they fought, their only inducement being the highest pay and the greatest plunder. They passed from one service to the other without the slightest compunction, and apparently without any discredit.[4]

In time of universal peace, however, these adventurous soldiers lost their only means of livelihood, and were left in a very unpleasant position in a foreign country. The result was that when peace was made the companies, thrown upon their own resources, their employment gone, their pay and rations stopped, their chances of plunder at an end, naturally closed together for mutual protection, and made up their minds that if others did not go to war they would do so, and

[1] Boutaric, 254. [2] Ibid. 257. [3] Ibid. [4] Hallam, i. 470.

still continue to earn a living with their swords. A partizan named Guarnieri, in 1343, was the first to unite these disbanded and dissatisfied mercenary cavalry under his command. His plan was not to make war, but to levy contributions and pay and support his troops by a system which, without the dangers and risks of battle, would secure as good or better remuneration.[1]

From that time for many years companies of adventurers organised upon the same principle, were the scourge and disgrace of Italy. A knight of Rhodes, named Montreal or Moriale, annoyed with the King of Naples, decided in the year 1353 to gather under his orders as many as possible of the disbanded soldiers and deserters who infested all parts of Italy. He concluded that if he could organise these small bands of petty thieves into a regular army of banditti, all Italy would become subject to his imposts.[2] His army soon consisted of 1,500 men-at-arms of great reputation for bravery, and more than 20,000 men of other grades. His company was a moving republic, bound together by a common danger and a common love of plunder. Immense sums were extorted from the rich cities of Tuscany and Romagna, to secure them protection from pillage. Montreal was soon put to death by the Tribune Rienzi,[3] in whose power he had incautiously placed himself. After his death Conrad Lando commanded the "Great Company," which had increased to 5,000 cuirassiers, and to a total of 20,000 men.

The greatest of all the partisan leaders of the age, and he who, as a distinguished general acquired a greater renown than all others, was an Englishman named Sir John Hawkwood, who was known to the writers of the time as Aucud or Agutus. He led a band of free companions into Italy after the peace of Bretigny, and after a time was appointed commander-in-chief of all the armies of Pope Urban V.

Hawkwood is remarkable from the fact that he is considered to have been the first real general of modern times, and this serves to prove that the system of mercenary bands of professional soldiers, who devoted their whole lives to the art of war, had a great influence in bringing about a revival in the scientific principles of conducting battles and campaigns. The Italian historians all speak with admiration of his skilful tactics in battle, his stratagems, and his well-conducted retreats. Before this period the historians do not seem to have understood either tactics or strategy, and the accounts of battles give little details save of individual combats.[4]

[1] Hallam. i. 470. [2] De Cerceau, Life of Rienzi, 346, 347. [3] Ibid. 393.
[4] Hallam, i. 472.

Hawkwood is noted not only as the greatest but as the last of the foreign condottieri or captains of mercenary bands. Alberic di Barbiano about this time in 1379 instituted the system of employing native mercenary troops, a system which soon superseded the employment of foreigners. His company of St. George was the school of a succession of great generals, who improved the art of war to a great extent, and formed the rudiments of that science which afterwards was developed and perfected under Turenne, Frederick, and Napoleon.

We cannot leave the consideration of these mercenaries who for so long exercised so great an influence upon the wars of Europe, without a slight reference to their custom of fighting. As the armies on both sides were composed of hirelings, who had little or no interest in the result of the wars, and whose sympathy was often greater towards each other than with the employers whose cause they were paid to defend, it can readily be imagined that the fighting was always half-hearted, and often but a mere pretence.

The consequence was that at no period of the world's history have wars been conducted with so little personal danger to the soldier. Decisive battles, said to have been warmly contested, are recorded in Italian history, in which very few lives were lost, even among the vanquished. This was caused partly by the completeness of the armour, partly from the other causes already mentioned, and partly from the desire on both sides to make prisoners rather than to slay, in expectation of securing the ransoms which it was the custom at that time to pay.

The losses were so small as to be ridiculous. Machiavelli says, when the Florentine army raised the siege of Furli to go to the relief of Zagonara in 1423, that "on encountering the enemy they were soon routed, not so much by the bravery of their adversaries, as by the severity of the season; for having marched many hours through deep mud and heavy rain, they found the enemy quite fresh, and were therefore easily vanquished. Nevertheless in this *great defeat famous throughout all Italy* no deaths occurred, except those of Ludovico degli Obizi, and two of his people, *who having fallen from their horses were drowned in the morass.*"[1]

Again at Castracaro in 1467, in the war between the Venetians and the Florentines, Machiavelli says that "a few slight skirmishes took place between the armies; yet in accordance with the custom of the times, neither of them acted on the offensive, besieged any town, or gave the other an opportunity of coming to a general engagement; but each kept within

[1] Machiavelli, History of Florence, book iv. ch. 1.

their tents, and behaved with the most remarkable cowardice." After some time being wasted in this way, at last *a regular engagement* took place which continued *half a day*. "Some horses were wounded and prisoners taken, *but no death occurred*."[1]

In fact, all the evidence seems to prove that the losses in the Italian campaigns of the fifteenth century were of the most trifling character. The lance's point could not penetrate the breast-plate, the sword could not crush the helmet, nor could arrows or cross-bow bolts pierce the solid armour. When a knight was unhorsed it was even then a difficult matter to kill him, and it always paid better to save him for his ransom.[2]

For the convenience of the reader we have continued the sketch of the mercenary troops and condottieri down to the fifteenth century, in order to treat the question all together; but during this same period in other parts of Europe infantry forces were appearing and exerting such an influence upon battles as to materially affect the progress of the art of war. We shall therefore go back somewhat in the order of time, and consider the archers of England and the Swiss pikemen, and endeavour to trace the effects of their victories, in reference to the development of the military science.

SECTION III.—ENGLISH ARCHERS AND SWISS INFANTRY.

The best infantry of the fourteenth century were without doubt the English yeomanry, composed principally of archers well organised and wonderfully skilful in the use of the long bow. They were commanded by nobles who did not disdain the service, and the king took the greatest care to encourage and improve the force. The yeomen, the strong and vigorous workers of the soil, were continually practising in peace in their own fields the use of the bow, which, at first enjoined upon them as a duty, soon became one of the most popular amusements of the people.

Almost every village had its archery butts, and the skill attained by the English bowmen seems almost incredible. They were able to shoot twelve arrows a minute, and many were able to shoot a second arrow into a first already fixed in the target.[3]

The weapon was the great bow over five feet in length, made of yew, and was capable of despatching a strong barbed arrow 240 yards. The arrows were very sharp and feathered

[1] Machiavelli, History of Florence, book vii. ch. 4. [2] Hallam, i. 475.
[3] Bardin, 225.

at the base. They were carried bound together in a sheaf, and fastened to the waist, and sometimes in a leathern bag, but were never carried in a quiver.[1]

When the battle was about commencing the archer loosened his sheaf, and placed some arrows under his left foot, the points outwards, and picked them up one by one as he required them. The late Emperor Napoleon III. says in his work on artillery, that a first-rate English archer, who in a single minute was unable to discharge his bow twelve times, with a range of 200 yards, and who in these twelve shots once missed his man, was very lightly esteemed.[2]

The personal competence and civil freedom of these yeomen rendered them fearless and self-reliant, a spirit which was encouraged rather than resented by the English nobles, who treated them with great consideration, commanded their companies, and dismounted and fought beside them in action. The French nobles treated their infantry on the contrary with great harshness, oppressed them in camp, and rode over them without compunction in the field, as for instance at Crecy, where the knights of the French army charged over and through their own allies, the Genoese cross-bowmen.

The number of archers that England could bring into the field was very great. In 1386, in addition to the army led by the Duke of Lancaster to Castile, Froissart says that the English forces consisted of 10,000 men-at-arms, and 100,000 archers.[3] He also mentions that in 1394, the King of England invaded Ireland "with 4,000 knights and squires, and 30,000 archers, all regularly paid every week, and so they were well satisfied."[4] The Irish cavalry of this period were light irregular horsemen, using neither saddles nor stirrups, and fighting with spears and javelins.

The Genoese cross-bowmen acquired also a high reputation as infantry soldiers, and large numbers of them used to be employed by neighbouring states. Philip de Valois at the battle of Crecy had a body of nearly 15,000 Genoese mercenary arbalétriers, and according to Père Daniel these cross-bowmen served him also on the sea.[5] As Genoa was a maritime republic, it is natural to suppose that her people would be well qualified to serve in the navy.

The English archers always seem to have fought against men-at-arms with great bravery, and do not appear to have been awed by the superior weight, splendour, or trappings of the haughty knights. In the many border wars which were continually going on between England and Scotland, the

[1] Violet-le-Duc, 173. [2] Lacombe, 135; Bardin, 225.
[3] Froissart, book iii. ch. 37. [4] Ibid. book iv. ch. 64. [5] Daniel, i. 109.

archer infantry repeatedly gained successes over the Scottish nobles, which were the first instances of the foot-soldiery beginning to meet the cavalry upon anything like equal terms.

It is very interesting to trace the growing importance of the infantry in these conflicts between the English and Scottish forces. Sir William Wallace, a man of extraordinary natural ability, improved the tactics of his time very materially. In the battle of Stirling, 1297, the skilful manner in which he allowed a portion of the English forces to cross the river Forth, and then attacked and defeated them under the eyes of the remainder of the army, who could not come to their assistance, gives the strongest proof of his ability as a general.

In the battle of Falkirk, in the following year, it is curious to see how closely Wallace had foreshadowed the modern method of resisting cavalry. He had in his army only 1,000 mounted men, and less than 30,000 archers and spearmen, while the forces of King Edward I. consisted of 7,500 men-at-arms, and it is said 80,000 foot-soldiers. Wallace was obliged to give battle against these overwhelming numbers, the 7,500 horsemen being the great strength of the English army. The old chronicler has fortunately given a description of Wallace's order of battle with such minuteness that we can see the whole arrangement at a glance. He ranged his army upon a slightly inclined plane, and formed his infantry in circles or clumps, or what we should now technically call "squares," the outer ranks being composed of pikemen, who, kneeling, presented their pikes as an obstacle to the charging horsemen; while behind them, in the centre of each clump or "square," stood the archers, who were to gall their opponents with their arrows. Behind these squares Wallace ranged his cavalry in reserve, evidently hoping to break his opponents' ranks with his pikemen, and to complete the victory with his horsemen.

The great numbers of the English, the fact that they were experienced in the wars on the Continent, and perhaps the novelty of the idea to the Scottish infantry, and the want of steadiness and discipline among them, led to the defeat of the clumps of spearmen and archers, and the whole Scottish army was most disastrously beaten.[1]

In this method of tactical formation we see the prototype of the mingled regiments of pikemen and musketeers which existed so long in the armies of Europe. We see also the ideas of the square, of the formation *en echiquier*, of the

[1] Burton, History of Scotland, ii. 301.

cavalry in reserve, the value of which principles are recognised even to the present day.

Shortly after this, at Bannockburn in 1314, Robert Bruce copied closely the tactics of his great countryman. The leading feature of the order of battle was the clumps of spearmen, with the cavalry in reserve. Here again the preponderance of the cavalry was all on the side of the English, Bruce's small force of horsemen being utterly unable to compete with them on the open field. Just before the action a sharp skirmish ensued between a body of Scottish spearmen under Randolph, and 800 English horsemen under Clifford. After a hard fight the spearmen were victorious, and the cavalry broken and driven off.[1]

Now, however, the English archers were beginning to attract attention by their great skill and bravery, and they were brought up to harass and break the serried ranks of the squares of spearmen. This movement on the part of the English would have soon given them the victory (for the spearmen could not defend themselves), had it not been for the prompt decision of the Scottish king. He at once led on his reserve of cavalry, charged the archers vehemently, and drove them back. The English horsemen then advanced in turn, when Bruce fell back through the intervals of the clumps of spearmen, and left them to withstand the onset of the English chivalry. The Scottish infantry stood as firm as rocks, and the horses at that time not being heavily armoured, were wounded and killed in great numbers, throwing the whole force into confusion, and paving the way for an attack of the cavalry under Bruce, which completed the victory. From this time we begin to see the great influence of the English archers.[2]

At the battle of Halidon Hill, near Berwick, in 1333, the Scottish cavalry dismounted to charge more steadily. They were, however, received with such valour by King Edward, and were so galled by the English archers, that they were thrown into disorder and utterly routed.

The battles of Crecy, Poitiers, and Agincourt, three of the most gallantly contested and decisive victories of that age, were won neither by the nobility of England, nor the feudal tenants, for these classes were fully matched in the French army, but the success was entirely due to the matchless skill and bravery of the English bowmen.

In the first action, that of Crecy, in 1346, Edward III. had an army consisting of 4,000 men-at-arms, 10,000 archers, 10,000 Welsh infantry, and 6,000 Irish. These Welsh and

[1] Burton, ii. 380. [2] Ibid. 383, 384.

Irish troops were of a light and irregular character, of no use in the front line of action, but well fitted for following up a pursuit. Cannon were used in this action, and it is said to have been the very earliest instance of their use in a pitched battle among civilised nations. The battle of Crecy is noted as a great epoch in the art of war for several reasons. In the first place, on account of the introduction of gunpowder, a discovery which revolutionised the art of war, and in which improvements have been and are continually being made ever since.

The mechanical skill of the day was not sufficient however to render the use of gunpowder very efficacious. The inventive faculty seems to have been far in advance of the nicety in workmanship necessary to give full effect to the various inventions. Through the clumsy and inefficient manner in which the different cannon and other firearms were made, the value of gunpowder and its immense influence was very slow in being perceived.

Revolving pistols similar to the deadly weapon of to-day, breach-loading rifles on the same principle as the present English Snider, cannon on the principle of the breach-loading Armstrong, were all invented and made hundreds of years ago, and specimens of them can be seen in the Tower of London and elsewhere. They all failed however in the workmanship, and on that account they at once fell into disuse. The great improvement in the mechanical skill of modern times has enabled so-called inventors to furbish up the old discoveries and to construct in an efficient manner the neglected inventions of bygone ages.

It can readily be understood therefore that at first gunpowder would not produce a striking effect, and this accounts for so little importance being given by the old chroniclers to the use of cannon at Crecy.

Another peculiarity which marks Crecy as a great epoch in the art of war is the extraordinary influence exerted by the English archers in a pitched battle against the proudest chivalry in Europe. At Crecy also we see the first instance of men-at-arms in a great action deliberately dismounting and fighting on foot with their lances as pikemen. St. Louis's knights, we have seen, used the same tactics at Damietta, but it was in a combat or skirmish covering a landing from vessels, and is no proof that the army in a regular engagement would have adopted such a course.

Edward III. at Crecy took up a defensive position and evidently intended to await an attack, and his manner of drawing up his army proves that he understood fully the

principle (unknown among the Crusaders) that cavalry cannot await an attack and maintain itself on the defensive. To give stability and order to his line, to oppose a firm and solid resistance to the charge of the hostile cavalry—which was far superior in numbers to his own—it was necessary for him to convert his lancers into heavy armed pikemen and form them in his line of battle as infantry.

In rear of his army he enclosed a large park or entrenchment for his baggage-waggons and horses, for he determined that all his army should fight on foot that day. His troops were drawn up in three divisions; the first line under command of his son, Edward the Black Prince, the second under the Earl of Northampton, the third under the king himself. The men-at-arms were in the centre, the archers on the flanks, and it seems that at the opening of the action they were extended across the front of the men-at-arms. In this order they calmly awaited the French monarch, who was advancing with an immense army many times greater than that of the English.[1]

The French were ranged in three lines also. It is the first battle fought in France of which history has left us complete details of the formation. The front line, according to Froissart, consisted of 15,000 Genoese crossbowmen; the second line, under the command of the Count of Alençon, comprised 4,000 gendarmes and a large number of infantry; the third line, under King Philip, consisted principally of the French *noblesse* and chivalry.

The Genoese arbaletriers opened the action by advancing and shooting their bolts against the English. A shower had relaxed the string of the crossbows so that the missiles fell short. The English yeomen, who had been able to keep their bowstrings dry, at once opened up with terrible volleys of their clothyard shafts which fell like hail. When the Genoese felt these arrows, which pierced their arms, heads, and armour, some cut their bowstrings, others flung their crossbows on the ground, and all turned about and retreated. The French had a large body of men-at-arms on horseback supporting them. When the King saw his mercenaries giving way, he called out in anger to his cavalry to charge them, which was done, and a struggle took place between the two parties of the French army which threw them into confusion. The disorder was much augmented by the continued flight of arrows which the English archers kept incessantly pouring in. The Welsh and Irish infantry, with long knives, mingled in the *mêlée* and slew many, their

[1] Froissart, i. ch. 127.

weapons being particularly well suited for a close, irregular struggle.[1]

The French horsemen, according to Froissart, seem to have extended beyond the front of the English archers and to have gone around them and attacked the men-at-arms in their rear. This attack was so vigorous that the second English line came to the Prince's assistance, and messages were even sent to bring up the third line, which King Edward refused to do, partly because he could see that the result was secure, and partly also to encourage his army by a show of extreme confidence.[2]

The result of the battle was a most decisive victory to the English, and to the archers belongs the credit. The men-at-arms on foot, using their lances as pikes, had also proved that they were able to hold their own in that way against the best horsemen of the day.

The real revival of the infantry force may fairly be said to date from the day of Crecy. Morgarten, fought some years previously, and of great influence no doubt in its way, was not so striking an example as Crecy, and could not have had so much effect upon the art of war.

The difference in the manner in which the infantry were treated by the English is in marked contrast to the conduct of the French nobility. It had for a long time been customary in France to place the feudal infantry in front, not with any idea that they could perform any real service, but to take the edge, as it were, off the freshness of the opposing chivalry. When the foot-soldiers were driven back, the knights had no compunction in riding through them, or over them, and treated them with great neglect, and greater cruelty. If they fought gallantly, and maintained their position too long, it equally brought down upon them the anger of the haughty nobles, who punished them as severely for gaining successes, which were considered the perquisites of the chivalry, as for suffering defeat.

Their cruelty to the Genoese mercenaries at Crecy was even greater than usual, but these foot-soldiers were paid foreigners, for whom there was no sympathy. The appearance of the crossbow-men in Philip's army shows, however, that the infantry were gradually assuming a certain recognised position. The King of France would never have employed so large a body of infantry at great cost, if they were not considered necessary to meet the English archers, whose fame had been spreading over Europe. Their being placed in the front line to open the battle looks as if great

[1] Froissart, i. ch. 129. [2] Ibid.

reliance was placed upon their ability to neutralise the efforts of the English archers. The anger of the French king on the defeat of his mercenaries was evidently caused by his disappointment.

The battle of Courtrai in Flanders, in 1302, was one of the earliest instances of the successful employment of infantry against men-at-arms. It was fought between the French chivalry, under Count Robert of Artois, and the sturdy burgesses of the Flemish towns, who were becoming rich and independent through their industry and energy. They were armed with pikes as a defence against the heavily-equipped French horsemen, and they handled their weapons with such steadiness and bravery as to completely defeat the knights with very great slaughter.[1] This appears to have been the first general action in which infantry pikemen were pitted against the mounted chivalry.[2] The pikemen employed by the Count of Boulogne at Bouvines, in 1214, was an earlier instance of the use of the pike, but it was an exceptional case, and not a general adoption of it as a weapon for offensive and defensive purposes.

The Swiss infantry about this period began to attract attention, and they soon won a reputation all over the Continent as infantry pikemen. The battle of Morgarten, 15th November, 1315, was the Marathon of Switzerland, and from that period that country enjoyed a certain degree of liberty.

This action was fought between 20,000 Austrians, under Duke Leopold, and 1,300 Swiss. The natural features of the ground had more effect upon the result, however, than any principle or system of tactics. Montfort of Tettnang, who commanded the Austrian cavalry, led them into the narrow pass of Morgarten, lying between Mount Sattel and the lake. Fifty men on the eminence overlooking the defile, which was filled with the hostile army, raised a sudden shout, and rolled down rocks and stones upon the crowded ranks. The confederate Swiss, to the number of 1,300, seeing the confusion caused by this attack, descended the mountain which bordered the defile, and charged furiously upon the flank of the disordered column. With their powerful maces and clubs they dashed in pieces the armour of the enemy, and delivered terrible thrusts with their long pikes. The narrowness of the defile admitted of no evolutions, and a frost having injured the roads, the horses were impeded in all their movements. Some leaped into the lake, all were thrown into disorder, and at last the whole mass of horsemen gave way, and fell back upon the infantry, and these, cooped up in the defile,

[1] White's History of France. [2] Bardin, 4421.

could neither escape nor open their files, and so were run over by the fugitives, and many of them trampled to death.[1] A general rout ensued, in which great numbers were slain.

This battle, very different from Crecy, simply taught the lesson that cavalry cannot scale precipices, or storm mountains, and the generals of the age should not have required so bloody an example to teach them so simple a lesson.

Crecy, fought on the open field in a fair stand-up sort of way, was the pure result of a tactical system, which owed no adventitious aid to any irregularities of ground, or strength of position, and was therefore a far more important action in a tactical point of view, than any that had occurred for several thundreds of years previously.

The battle of Sempach was another victory gained by the Swiss infantry, who were mainly armed with spiked clubs called morning stars, and swords, and battle-axes. It was fought on the 9th July, 1386. Leopold III. Archduke of Austria, who commanded the Austrian chivalry, caused them to dismount, and fight on foot with their lances. It is said, that in order to be more active while dismounted, the knights cut off the peaked points on their boots, which in the absurd fashion of the day were of extravagant length.

The knights formed in phalanx order, their front bristling with the lance points, against which the Swiss infantry exerted themselves in vain. The battle was won according to tradition, and to contemporaneous accounts, by the devotion of Arnold of Winkelried, who, calling upon his comrades to have a care for his wife and child, rushed upon the enemy's spears, grasping as many he could reach, and by the sacrifice of his life making a gap, through which his comrades succeeded in getting into close quarters with the foe.[2]

> "Four lances splintered on his crest,
> Six shivered in his side;
> Still on their serried ranks he pressed,
> He broke their ranks and died."[3]

Then crashed the helmets and armour under the blows of the morning stars. The lances, once the order was broken, were of no use in the *mêlée*, and the lighter armed Swiss soon defeated them with great loss.

The battles of Granson and Morat in 1476 were won by the Swiss pikemen over the cavalry of Charles the Bold. They completed the reputation of the Swiss as steady infantry, and were severe blows to the expiring chivalry.

[1] Borthwick's Book of Battles, 204. [2] Book of Battle Songs, 108.
[3] Battle of Sempach. Translated by Scott.

The battle of Poitiers, 19th September, 1356, shows a still further development of the art of war, and is another illustration of the great value of the English bowmen, and of the growing feeling in favour of infantry in action. The French army consisted of about 60,000 men under the command of King John in person. The English army under the Black Prince was only 8,000 strong; but skill in generalship was beginning to be understood, and the English prince, it seems to us, proved in this action that he was the ablest tactician of his age. His measures were well conceived and skilfully carried into execution, and give greater proofs of scientific ability than are found in any previous battle of the middle ages.

He drew up his army on a hill in a strong position, broken up by hedges, vines, and bushes, and difficult of approach, the only avenue leading to it being a defile between hedges. This defile he lined with numbers of archers and in rear of it, drew up his men-at-arms, on foot, with the remainder of his archers on the flanks in triangular masses. His horses and baggage were parked and secured by an entrenchment in the rear, as was done ten years before at Crecy.

The French army was drawn up in three lines, in rear of each other. Their attack was made by three hundred of their best horsemen, followed by a number of gendarmes on foot: the intention being to carry the defile by a rush, and under cover of the horsemen, push through a large body of heavy armed troops on foot, who were to attack the English dismounted men-at-arms. As the Black Prince had entrenched and defended his position by obstacles, it is probable that the plan of attack adopted by the French was the only direct one open to them, for the ground was evidently unfitted for horsemen.[1]

The result was disastrous, through the efforts of the bowmen who lined the defile. They poured in their deadly arrows at the closest range, and with fearful force, and the narrow road was soon filled with the dead and dying horses, and men falling in heaps, under the pitiless volleys of the English shafts. A few succeeded in clearing the defile, only to be killed or captured on emerging.

The dismounted gendarmes, unable to clear the narrow passage before them, disheartened by the carnage taking place in front of them, and harassed by the arrows that began to fall fast among them, soon gave way and retreated in confusion upon the second line, carrying with them the depressing news of the disaster.

[1] Froissart, ch. 161.

At this crisis the English prince gave proof of that military genius which made him the greatest general of his age. Although weak in numbers, although compelled to await the action upon the defensive, and to fortify his position, his quick *coup d'œil* saw that the instant had arrived to change his plan of battle, and, abandoning the defensive, to assume a vigorous and dashing offensive policy.

That rapid decision evinced genius, but his method of carrying it into execution gave proof of tactical ability far beyond the times. He detached a body of 600 cavalry and a large force of archers to support them, and by a detour around a hill, out of sight of the enemy, he was able to execute a well-directed attack upon the left flank and rear of the second line of the French army, then somewhat shaken by the fugitives from the front. At the same time he mounted all his horsemen and led a furious charge direct upon the enemy as the detachment attacked them in flank.

In that age of imperfect tactics and ignorance of manœuvres, one can readily imagine the terribly demoralising effect of a flank attack upon the undisciplined levies of a mediæval army.

The French gendarmes, evidently in imitation of the English at Crecy, received the attack, dismounted, and were at once routed by the gallant charge of the English knights. The French did not seem to understand that at Crecy the main reliance of the English was placed upon the archers, and that the men-at-arms were dismounted to support them and give a stability to the line of battle. The French dismounting on the open plain, when they were unsupported by archers of any value, was a waste of available power, for they had cavalry enough to have poured in fresh reserve after reserve until the victory was assured.

The French generalship was as bad as it could well be. The French king was in his own country, his cavalry immensely superior, while the Black Prince was in a hostile territory, short of provisions, and greatly outnumbered. King John should have cut off the English foraging parties, watched their movements, refused to attack in so strong a position, or if he did attack he could easily have turned either flank and avoided marching through so dangerous a defile! The Black Prince saved his army from a great danger, but he was much aided by the mismanagement of his enemy.

Viewed altogether Poitiers marks a distinct step in advance in the art of war—for it shows an appreciation by the English general of the respective values of the two services, and to how to employ each skilfully in its own sphere. His

arrangements to use his men-at-arms as infantry in the beginning of the action, and his rapid change from cautious defence to the impetuous charge of cavalry in the crisis of the battle, we will venture to assert, evinces a knowledge of the characteristics of the different arms not shown by any general of his time or for hundreds of years before him.

The battle of Homildon Hill, fought in 1402 between the Scotch under Earl Douglas and the English under the Percys, is another remarkable instance of the increasing power of the English infantry against cavalry in the open field. Douglas drew up his army in a deep square on Homildon Hill which was an excellent position to resist cavalry. The English army was drawn up on the opposite eminence, which the Scotch allowed them to do without resistance. Had Douglas at once charged with his 1,000 Scotch knights and men-at-arms and reduced the fight to a close hand-to-hand conflict it would have been his best policy, but he awaited the attack, and the English, instead of charging with their cavalry, sent on the archers who, slowly advancing, poured their volleys as thick as hail upon the Scots, who wedged closely together were struck down without a chance of returning a blow. The effect was dreadful, for the English shafts pierced with ease the light armour of the Scots, which was no defence against the deadly missiles. The better-tempered armour of the knights was found utterly unequal to resist the arrows, when, owing to the steady advance of their phalanx, the archers took a nearer and more level aim. Numbers of the barons and gentlemen were killed and mortally wounded. The horses, goaded and maddened, reared and plunged and became unmanageable. The Scotch, to the number of one hundred, under Sir John Swinton, charged desperately, but were struck down and dispersed. Douglas then charged with his cavalry. The archers fell back on their own horsemen, still pouring in volley after volley, slowly retreating, and inflicting appalling carnage. Walsingham states that the coat of mail worn by Douglas had occupied a skilful workman three years in its construction, yet he was wounded in five places by the arrows, and captured. This action was won by the bowmen alone; there was no hand-to-hand fighting, the cavalry being only employed in the pursuit.[1]

The next important European battle was that of Agincourt, fought on the 25th October, 1415, between Henry V. of England, and the French army under the Constable of France. The English forces were less than 10,000 men, the French nearly 100,000. The battle in its main features was

[1] Tytler's History of Scotland, ii. 430, 431, 432.

very similar to Crecy and Poitiers, the archers again exercising a great influence upon the result of the action.

Henry showed considerable skill in forming his army for battle. He took up a strong position on a narrow piece of ground between two woods which protected his flanks. He placed in ambush in advance of his flanks, two detachments, one consisting of 200 archers, the other of 400 men-at-arms, who were to fall upon the flank and rear of the French, when the battle had fairly joined. In this he followed the example of his great uncle the Black Prince, who first in later times used this plan of tactical action. It will be remembered that this stratagem was identical with the ambush of Mago at the battle of the Trebbia.

The English army was formed in three divisions. The archers were placed in front of the men-at-arms in the form of a wedge on each flank, and along the front in line. The archers' equipment had received an addition which was first employed in this action, and was evidently an adaptation of the pike and its successor the bayonet of the present day. The archer carried his bow and arrows, a bill-hook, a hatchet or hammer, and a long stake sharpened at both ends, which he was to fix obliquely in the ground before him so as to serve as a firm pike to resist the direct charge of cavalry. The upper end was tipped with iron and presented a formidable obstacle to advancing horsemen. It was a new precaution, never before used in a war by Christians. These pikes formed a rampart that could be erected at once and taken down and put up again at every change of position. Agincourt forms another epoch in the improvement of the infantry service, and in its increased ability to defend itself against cavalry.

The men-at-arms fought on foot again in this action. The French chivalry were soon put in confusion by the constant volleys of arrows which the archers poured in upon them from behind their rampart of pikes, and by being overcrowded in the narrow space between the woods. The flank attack of the two detachments at this juncture completed their disorder, and then the English king gave the order to advance, and archers and men-at-arms charged upon the enemy. Being lightly equipped they fell with their battle-axes upon the French, who by this time were so crowded together they could neither fight nor fly, and hewed them to pieces almost without resistance. Henry showed great ability in changing from the defensive to the offensive at the proper moment and a brilliant victory was the result. The losses of the French army in nobles and gentlemen both killed, wounded, and

prisoners, were enormous, the killed as well as the captured being both greater by far than the whole numbers contained in the English army. The English losses were comparatively trifling.

The war between France and England had already been carried on with little intermission for over seventy years, and the armies had naturally changed from the feudal to the mercenary type. The battles of Crecy, Poitiers, and Agincourt, had delivered a death-blow to the institution of knighthood, and the method of warfare based upon it. Troops became organised in bands under regular leaders, infantry masses were acquiring an importance that could not be ignored, the features of the ground were beginning to be considered, pikes had been invented, and the day for the irregular combats between lines of knights burning to distinguish themselves by deeds of arms, had passed for ever. A new system was evolving itself from the ruins of chivalry and feudalism, and the time was fast approaching, when the standing armies of monarchs were to become the sole defence of states.

SECTION IV.—THE INTRODUCTION OF REGULAR ARMIES.

The earliest instance we have in public national history of the establishment and maintenance of what might be termed a standing army, occurs in the reign of Canute the Great, King of England, Denmark, and Norway, about the year 1025.

Canute maintained permanently under pay a body guard called huscarles. They consisted of 6,000 men, and great attention was bestowed upon them to secure uniformity of discipline, and to separate them decidedly from the people. They were distinguished by their dress and golden ornaments, and displayed a military spirit of mutual union and order very remarkable for the age.

To Charles VII. of France, however, is due the credit of being the first to establish a permanent army, and by that means to secure internal order in his kingdom, as well as an efficient national defence.

Charles had succeeded in 1444 in driving the English out of the greater portion of the kingdom of France, and a long truce was concluded between the two rival powers. This left him with a large army of paid mercenaries, no longer required, but who, if once disbanded, would he feared combine in great companies, and make a subsistence by plundering and robbing the people in every part of the country. In order to guard

against this, to secure the internal peace of the kingdom, and to establish firmly the royal authority, Charles VII. decided to form a permanent paid army consisting of the best soldiers he could select. This decision was arrived at in 1445, and was kept secret until the organisation of the new force was completed. The provost marshals in all the Provinces were ordered to have their archers in readiness to take the field, and to fortify themselves with the assistance of the magistrates of the towns, and the nobles of the country, and to patrol all the great roads, to prevent the disbanded mercenaries from pillaging, or uniting in bands against the authority of the king. These precautions being taken, the king chose fifteen captains, men of position, honesty, experience, and courage, explained his design to them, and asked their assistance in establishing a permanent force. He ordered them to choose from all the troops in the army the best men, those on whom the most reliance could be placed for preserving exact discipline, and to form them into companies.

The enrolment was completed, the service rolls submitted to the king, and an edict was made establishing fifteen companies of *ordonnance*. A proclamation announced the fact to the army, and ordered all those soldiers not enrolled in the corps, to disperse, and go at once to their own homes, without committing any disorder upon the route, without leaving the main roads, and without banding themselves together, under the pain of death.[1]

So judicious were the preparations and so well carried out, that the disbanded soldiers went quietly to peaceful pursuits, and after fifteen days they were no more to be seen upon the roads.

The fifteen companies so formed by Charles VII. were all cavalry, and contained, according to most writers, 100 lances each, although an *ordonnance* of the month of December 1445, fixing the garrison of Poitou at 200 lances, divides them into three companies, one of 110 lances under the Seneschal de Poitou, one of 60 lances under the Mareschal de Loheac, and one of only 30 under Captain Floquet.[2]

It is probable, however, that the fifteen companies contained 1,500 lances. Each lance consisted of six men: the man-at-arms, three archers, a *coutillier* or squire, and a page or valet. They were all mounted, and made a total of about 9,000 cavalry. There were also usually attached a number of gentlemen volunteers, who served without pay, in the hope, in case of a vacancy occurring, of their being taken on the regular establishment.[3]

[1] Daniel, i. 153. [2] Boutaric, 312. [3] Daniel, i. 154.

The *lance fournie* at this time had 13 horses, the man-at-arms had four, each archer two, the coutillier two, and the page one.[1] The staff consisted of a captain, lieutenant, a guidon, an ensign, and a mareschal de logis.[2] These officers were chosen as the noblest, the richest, and the most skilful soldiers of the company, which was all composed of gentlemen.

Discipline was well maintained, and the captains were held responsible for any disorders or offences perpetrated by the men of the companies.[3] They were kept in garrison in the towns, in order tnat the discipline should be carefully kept up, the men retained under subjection, and that opportunities should be given for drilling and manœuvring together.

The troops were not paid directly by the king, although absolutely under his orders. The different municipalities were compelled to maintain the troops quartered among them ; the cities, towns, villages, and country parishes all furnishing their quota towards the pay and food of the soldiers.[4]

The benefits of this system were immediately felt, and no measure could have been more politic and more popular among the people than this institution of a permanent defensive force. Confidence at once sprang up among all classes. The authority of the crown became paramount throughout the kingdom, and artisans worked at their trades, and peasants and farmers cultivated their lands, and raised cattle and sheep in security against robbery and outrage.[5] Except in the neighbourhood of a foreign army in time of war, industry was encouraged, and could depend upon reaping the product of its toil.[6]

The companies of gendarmerie were heavily armed. The man-at-arms was armed from head to foot in plate armour like the knight, and for weapons carried the short lance, a two-handed sword, and a battle-axe or mace.[7] The archers and esquires, less heavily armed, had the cross-bow, the lance, sword and poignard, and the mace which hung at the saddle-bow. They wore an iron breastplate over the coat of mail. Some wore the hauberk or brigandine, a light cuirass made of scales of iron sewn on leather.

About the same time Charles VII. organised the free archers, which were established on the principle of each parish furnishing one archer chosen by king's officers called "*élu.*" The most skilful bowman was to be selected and equipped with helmet, sword, dagger, and brigandine, and he

[1] Gay de Vernon, 7. [2] Humbert, 64. [3] Daniel, i. 155.
[4] Ibid. [5] Hallam, i. 266. [6] Daniel, i. 155. [7] Gay de Vernon, 8.

was obliged every Sunday and feast-day to practise archery fully equipped in his arms, for a certain length of time in order to become dexterous in their use.[1]

The archer was exempt from all charges and taxes of every kind, and while under pay received four francs a month from the parish. This was not, properly speaking, a permanent force, but a species of militia. Louis XI. increased the effective force of archers to 16,000 men. They were divided into four corps of 4,000 each, and each corps was subdivided into eight companies of 500 each.[2] The force, however, being composed of men drilled singly to the use of the bow, but having no opportunity of acquiring that mutual confidence and regularity of movement which constant exercising in bodies in time of peace always produces, proved when brought together for a campaign to be of little use, and to have lowered the character of the French infantry to a great extent, so much so, that the kings endeavoured to supply themselves with foot-soldiers by mercenaries hired from abroad. Louis XI. commenced the practice of employing Swiss, a custom that was in use in France till the Revolution.[3] He had at one time as many as 10,000 Swiss infantry in his pay, besides a large number of German lansquenets.

By this time the cavalry had ceased to range themselves in single line for the combat, which had been the custom under the feudal system and the age of chivalry. The archers soon came to be mingled with the men-at-arms, and shortly after they began to form in squadrons ranged in three ranks, as each man-at-arms was followed by two archers. It is impossible to fix the date of these changes. La Noue says that the French gendarmerie fought in single line up to the reign of Henry II.[4]

It is said that the system of forming cavalry by squadrons was well understood by Charles the Bold of Burgundy, and in use by him in his army.[5] He published a book of military regulations to be followed by his troops, which is the first book on military tactics or drill in the renaissance of the art of war.[6]

Cavalry evolutions were not known, however, before 1473, for the cavalry service could not arrive at any degree of perfection before the sovereign was sufficiently powerful to control his nobility, and compel them to submit to discipline.

[1] Duparcq, ii. 14. [2] Ibid. 15. [3] Ibid. 16. [4] Ibid. 24.
[5] Ibid. [6] Humbert, 66.

PERIOD III

FROM THE INTRODUCTION OF FIREARMS TO FREDERICK THE GREAT

CHAPTER VIII.

INTRODUCTION OF FIREARMS.

THE military art about the middle of the fifteenth century was in a state of transition, and various influences were beginning to so affect it as in time to produce a complete revolution in the manner of conducting war, and to pave the way for the system at present in use.

The English infantry and the Swiss pikemen had given a severe blow to chivalry, and it only required the introduction of missile weapons, of sufficient force to pierce the massive defences of the men-at-arms, to deprive them of their great prestige, and to bring them more on a level with other forces.

The changes, however, were very gradual, for it took many years for the invention of gunpowder to be so utilised, and the weapons adapted to it to be so improved, as to render its use more effective than the old projectile weapons, which had been brought to perfection. Consequently we find for a very long period both types of missile weapons used contemporaneously in most armies.[1]

Heavy cannon are first mentioned in the year 1301, when the town of Amberg, in Germany, had constructed a large gun.[2] Ghent had them in 1313; Florence in 1325; the Germans in 1328. Edward III. used them at the siege of Cambrai in 1339, and at Crecy in 1346. In Switzerland they were not introduced till a later date. The first cannon cast in Basle were made in 1371; at Berne in 1413. Cannon

[1] Daniel, i. 319. [2] Demmin, 52.

were introduced into Russia in 1389, and the Taborites used howitzers in 1434.[1]

Portable firearms were a somewhat later invention, and they are first mentioned among the Flemings about the middle of the fourteenth century. They were adopted at Perugia in 1364; at Padua in 1386; in Switzerland in 1392. They were also used at the battle of Rosebecque in 1382, and at the siege of Trosky in Lithuania in 1383.[2]

They were continually being improved until in 1420 we find that, at the siege of Bonifacio in Corsica, leaden bullets fired from small hand-cannon even penetrated the solid armour.[3] There were many various kinds of portable arms. The first was a weapon clumsily constructed of iron, and fastened to a rough piece of wood. It was fired by a match applied to a touch-hole on the top. This cannon was often served by two men. Small hand-guns of this style were used by the cavalry, and were called petronels, because they rested against the cuirass. Then came the improvement in the stock, enabling it to be fired from the shoulder, with a touch-hole on the right side.[4]

Many improvements were made in the appliances for igniting the charge. The match was first attached to a serpentine or small linstock, then the matchholder was supplied with a trigger without a spring; and about the latter half of the fifteenth century the arquebus was invented, which was supplied with a matchholder, a trigger, and spring. This was a very good weapon, and the prototype of the weapons of the present day. The wheel-lock was the next, invented in 1515 at Nuremberg, but did not entirely replace the matchlock, which was more simple and sure, and less liable to get out of order.[5]

The rifled barrel was invented in Germany, some say at Leipsig, in 1498, some say at Vienna. The bullet was driven in with a mallet. This weapon was not employed as a military arm on account of the trouble in loading, and the time required to do it. It was not till after the American revolutionary war that the French in 1793 adopted it in their army, under the name of the carbine of Versailles.

The snaphaunce was the next invention in the shape of a lock, and was the forerunner of the flint-lock. The snaphaunce is first mentioned in 1588. The flint-lock is supposed to have been invented in France about the year 1640, and soon afterwards the bayonet with a socket was introduced into the French army by Vauban.[6] The old matchlock, however,

[1] Demmin, 63. [2] Ibid. 67. [3] Ibid. [4] Ibid. 68.
[5] Ibid. [6] Ibid. 70.

was not entirely replaced with the new gun with the hammer until the year 1700.

Prince Leopold I. of Anhalt Dessau introduced the iron ramrod among the Prussian infantry in 1698. Cartridges were first used in Spain in 1569, but were not used in France till 1644. Gustavus Adolphus invented the cartridge-box in 1630. The percussion-cap musket was invented in 1807 by a Scottish armourer named Forsyth.

Breech-loading firearms, as already mentioned, date from the end of the 15th and beginning of the 16th century. They were all of German invention. Marshal Saxe invented a breech-loader, and armed a regiment of Uhlans with them. They did not work well, however, probably from defective workmanship. Repeating guns and revolvers are also old inventions, but the revolvers were of little practical use till the Colt pistol was made, which is now the best of all, and more used than any other.

We have thrown together in this chapter a synopsis of the dates of the principal changes in the various kinds of firearms, as an introduction to the consideration of the important influence which the invention of gunpowder had upon the cavalry service.

CHAPTER IX.

USE OF FIREARMS BY CAVALRY.

NOTHING probably will give a better idea of the composition and equipment of the armies of the latter part of the 15th century than the details, given by the historian Paul Jove, of the entry of Charles VIII., King of France, into Rome, in 1494, with a fine army evidently well organised and equipped, and superior to the armies of the time. Machiavelli states that he conquered Italy with "a piece of chalk"—a figurative expression, meaning that he had only to mark out the cantonments and billets for his troops as he marched onwards.

Paul Jove begins by stating (as a fact worthy of attention from its novelty) that the different bodies of cavalry and infantry were perfectly distinct and separate.[1] The first battalions were Swiss and German mercenary infantry, who marched in cadenced step to the sound of music, and the historian praises highly the fine appearance and incredible order with which they moved under their flags. Their arms were short swords and pikes ten feet in length, of wood pointed with iron. About a quarter of the infantry carried halberds with heavy battle-axes attached, while one hundred of them out of every thousand were armed with escopettes, a species of arquebus.

These details as to the infantry are interesting, as showing the commencement of that system of mingling pikemen and musketeers in the same regiments, which for so many years was the regular method of fighting in Europe.

After these infantry came 5,000 Gascons, nearly all slingers or crossbowmen. They were light irregular troops, but highly trained in the art of throwing the javelin, the stone or the arrow.[2]

Then came the cavalry, a force conscripted from the nobility of France. This pre-eminence in the composition of cavalry was the natural result of chivalry, and, resting upon custom

[1] Carrion, i. 452. [2] Ibid. i. 454.

and tradition, was long the established principle. Even two centuries after this time, under Louis XIII., the infantry were punished with the stick, an instrument of chastisement forbidden in the cavalry, where the sabre only was used, because, as the regulations explained, the cavalry were composed nearly altogether of gentlemen.

These cavalry were magnificently equipped with heavy armour covered with cloaks of silk, and wearing collars and bracelets of gold. The horses were tall, powerful animals, with the tails and ears cut. The armour was beginning to lighten itself a little, for these French knights had abandoned the use of the horse armour made of hide, which was still retained by the Italian men-at-arms. The cavalry were divided into lancers or men-at-arms, and archers or light cavalry. The lances were strong and effective weapons, well ironed, and in addition to them the knights carried maces.

The man-at-arms, his page, and his esquires, were ranged together, and evidently formed the heavy cavalry, while the archers were detached and formed up separately, as a distinct corps of light horsemen.[1]

These archers, although employed detached, were nevertheless still connected with the chevalier, in whose lance they were reckoned for all administrative purposes. They were armed with a long bow as used by the English, and shot long arrows. Their armour consisted simply of the breastplate and casque. Some of them carried javelins, which they used to pierce the men-at-arms whom they might succeed in unhorsing.

Four hundred chosen mounted archers of the guard surrounded the king, who was accompanied by two hundred French nobles heavily equipped with brilliant armour, and carrying heavy maces.

The artillery of this army was the finest that had yet appeared in Europe. It consisted, according to Mezerai, of 140 heavy cannon, and a great number of smaller pieces. They were mounted upon carriages drawn by horses, and worked by gunners who were skilfully trained to their use.

It is generally admitted that the overpowering force of artillery in his army enabled Charles VIII. to traverse Italy almost without opposition, as the Italians were poorly provided with inferior artillery drawn by oxen.

Shortly after this epoch appeared Machiavelli's "Treatise on the Art of War," which shows on his part a very clear insight into the principles of warfare, and a very correct appreciation of the reforms required.

[1] Carrion, i. 456.

Machiavelli wrote at a most interesting period, just when the military institutions of the middle ages were beginning to fade away before the improvements and changes in arms, which have led to the modern system of conducting war. His views therefore are of much interest to the military reader, as they convey the contemporary ideas of the transition period.

He argued strongly against the system of employing mercenary bands, and advocated the training of the citizens to the use of arms, and compelling them to turn out in defence of the state—saying that the best soldiers of Greece and Rome were also the best citizens.

Although all the prejudices of the age were in favour of the cavalry, Machiavelli saw the future influence of infantry, and without hesitation laid down the principle that the infantry is the solid and real strength of armies and of nations.

He says that the infantry of his day wore the demi-cuirass, or breastplate, and carried a spear, or pike, eighteen feet long, and a broadsword. Very few wore backplates, greaves, or gauntlets, and none at all either casque or helmet. Some few carried halberds, with heads like a battle-axe, and a few also were armed as musketeers. Machiavelli published his Art of War about the year 1516, or twenty-two years after Charles VIII. entered Italy; so it will be seen that the custom of mingling pikemen, halberdiers, and musketeers in the same regiments had by that time become generally the practice in Europe.

This system of arming infantry was in use among the Germans and Swiss, but was originated among the latter; for being poor, and desirous of defending their liberty against the encroachments of the German princes, who maintained a powerful cavalry, which the poverty of the Swiss prevented them from doing, they were obliged to devote their attention to the best method of fighting on foot. "The pike enabled them," says Machiavelli, "not only to keep off the horse, but very often to break and defeat them."

The Germans, who copied the method from the Swiss, put so much confidence in this sort of infantry, that with 15,000 or 20,000 of them they would attack any number of horse. Machiavelli says there had been many examples of this about the time he wrote, and that the general opinion of their excellence, from the many remarkable services they had rendered, was so favourable, that from the time of Charles VIII.'s expedition into Italy, all other nations had adopted the same weapons and manner of fighting, the Spaniards, in

particular, having obtained very great reputation by the use of such a force.[1]

Philip Visconti, Duke of Milan, being invaded by an army of 18,000 Swiss, sent his general, Count Carmignuola, at the head of 6,000 cavalry, and a small body of infantry, to attack them. The Milanese were defeated with great loss. Carmignuola, who was evidently an able general, perceiving the advantage that the pikemen had over his horsemen, raised a fresh army, and again attacked the Swiss. This time he dismounted his gendarmes on going into action, and converting them into pikemen, they fought so well on foot, that being well armed and fresh, they defeated the lightly armed and defenceless Swiss with immense loss, 15,000 being killed, and the remainder taken prisoners.[2]

To secure invulnerability, the cavalry of the end of the fifteenth century and the beginning of the sixteenth, had so overloaded themselves with armour as to deprive them of all rapidity of movement, and to render them almost incapable of injuring their opponents. Machiavelli appreciated fully the disadvantages of this system. He says: "I am not of opinion, however, that we ought to depend any more upon cavalry, in general, than they did in former times, for we have often seen them shamefully beaten of late by infantry." And he quotes in support of his view the uselessness of the cataphracti in the army of Tigranes, at the battle of Tigranocerta, where they were so overloaded with defensive armour as to be hardly able to see, much less to annoy the enemy, and if unhorsed were unable to get up again, or use their arms. In his History of Florence he gives several instances showing that history had repeated itself, and that cavalry men of his day, when unhorsed, had been suffocated in the mud through inability to rise.

He then gives his ideas as to the proper uses of cavalry in the following words: "It is right, however, to have some cavalry to support and assist infantry, but not to look upon them as the main force of an army, for they are highly necessary, to reconnoitre, to scour roads, to make incursions, and lay waste an enemy's country, to beat up their quarters, to keep them in continual alarm, and to cut off their convoys; but in field battles, which commonly decide the fate of nations, and for which armies are chiefly designed, they are fitter to pursue an enemy that is routed and flying than anything else."[3] It is remarkable that a man like Machiavelli, a politician and a writer, but not a soldier, should have had such

[1] Machiavelli, Art of War, iv. pp. 55, 56, Farnesworth's Edition, London, 1775.
[2] Ibid. 58. [3] Ibid. 62.

correct ideas upon the art of war when its principles were so little known. We have referred at some length to his writings here, as he seems to be the first scientific writer on the art of war of modern times, and his views are of great interest, as showing the dawn of the renaissance in the military art.

About the beginning of the sixteenth century the infantry service had evidently begun to assume a position much better than it had previously held, and was beginning to rival the heavy armed cavalry even upon the field of battle. This was brought about by two causes—first, the great weight and consequent sluggishness of the unwieldy horsemen, which prevented charges being pressed home with vigour; and secondly, the effect of the superior organisation and armament of the foot-soldiers. The pikes, which were used to prevent a charge of cavalry, were so long and powerful that when the infantry were steadily formed, and the pikes firmly presented, it was almost impossible for cavalry to break their ranks. The arquebuses and muskets which were used with them also enabled the foot-soldiers to inflict some loss upon the horsemen without much danger to themselves, and even if the infantry were somewhat shaken, the halberdiers with their battle-axes were a very formidable foe to encounter. As soon as the improvements in firearms enabled the musketeers and arquebusiers to inflict wounds in spite of the heavy defences worn by the gendarmerie, the turning point was gained, and the infantry at once asserted its superiority.

It was long, however, before the firearms reached such power as to be able to penetrate armour, and then it was only at point-blank range and by a perpendicular blow that the bullet would pierce the heavy breastplates. Consequently the defensive armour, which had been much strengthened at the introduction of gunpowder and firearms, was long retained by the cavalry, who set about to apply to their own use the new invention which they at once felt was the most dangerous weapon their service had yet encountered.

The knights, or heavy horsemen, at a very early period made use of the petronel, a species of hand-cannon, so called from being rested against the cuirass (poitrail) when fired. These petronels were plain tubes with a straight wooden stock, and were fired with a match applied to a touch-hole on the top. The end of the stock resting against the breast, while the muzzle was steadied by a rest with a fork or crotch which stood up from the pommel of the saddle.

At the outset, before these firearms had acquired sufficient power of penetration to pierce the massive breastplates of the cavalry, the horsemen riding up and firing from petronels

upon lightly armed infantry would have a certain advantage over them, as, being invulnerable themselves, they could still inflict loss upon their opponents. Armour, which had increased in strength about the time of the introduction of firearms, was somewhat lightened about the middle of the sixteenth century; but the movement in that direction was checked, and towards the latter end of the century the armour was heavier than ever for a short time.[1]

The constant improvements in the arquebus soon rendered necessary an increased strength in the cuirass, and in order to be enabled to carry the extra weight, unnecessary portions of the armour were abandoned. The first step in the abolition of armour took place about the latter half of the sixteenth century, when the greaves and sollarets (defences for the feet) began to be laid aside altogether. The next step was the disappearance of the "*braconnière*" and "*tassettes*," which were replaced by large cuissards, or thigh-pieces, which reached to the knees.[2] The *passe-gardes*, or elevated shoulder-pieces, were abandoned about the same time, and simple and compact *epaulières* took their place. The greaves and sollarets were replaced by long heavy leather boots. Armour modified in this way lasted a long period, being in use somewhat in this form for nearly a century.

As the firearms improved so did the infantry improve their relative position in reference to the cavalry; and partly from this cause, and partly from the difficulty of obtaining the large and powerful horses required for its use, the lance, as a weapon, began to lose its old pre-eminence and to be less relied on by the cavalry.

The greater the progress in the application of gunpowder to military purposes, the more the horsemen naturally desired to make use of it and apply it to their own service. The result was a rapid spread in the use of firearms in the cavalry service all over Europe.

The petronel, as we have already said, was the first firearm used; it was sometimes called the arquebus-à-croc. The arquebus-à-rouet, or wheel-lock, which was invented in Nuremberg in 1515, was soon used by the cavalry because its management was more easy on horseback.[3]

A new weapon was invented early in the sixteenth century, called the pistol, some say from its being first made at Pistoja, in Italy, but Demmin, who is a good authority, derives it from *pistallo*, which means pommel. Pistols are said to have been first introduced into England in 1521 and into France about

[1] Daniel, i. 290. [2] Boutell, 156. [3] Humbert, 77; Demmin, 519.

1531.[1] They were in use by the French infantry at Cerisoles in 1544, who used them under the protection of the pikemen.[2] The German cavalry, or *Reitres*, used pistols at the battle of St. Quentin in 1557.[3]

The invention of the wheel-lock pistol was a great advantage to the cavalry, as it gave them a weapon easily managed on horseback and one capable of inflicting a deadly blow. The pikes, the arquebuses of the infantry, and the clumsiness of the horsemen, who were unable to charge faster than a slow trot, soon caused the cavalry to forget that their great advantage consisted in the impetuous charge and the violent shock of men and horses, and led them, contrary to the genius of the service, to employ firearms against infantry similarly armed. It is extraordinary how the prejudices of an age impede the improvements and reforms which constant changes are continually rendering necessary. The spirit of chivalry had not yet died out, and the feeling in favour of horsemen was so great that it was actually believed that horsemen, mounted upon animals that raised them up a distinct mark for missiles, could abandon their impetuous charges and rely mainly upon the use of projectile weapons, requiring careful and steady aim, against infantry who, firmly ranged on solid ground, were using more powerful weapons of the same type with every advantage in their favour.

The Germans seem to have first used the pistol with much effect. They adopted a system of forming their cavalry in very deep bodies, sometimes as many as sixteen ranks in depth. Their method of fighting was by riding up to the enemy without charging, and upon arriving within range of their pistols they fired two pistol shots each, and then the front rank wheeled to the right or left and unmasked the second, which took up the fire, while the leading rank were retiring to the rear, where they formed up in reserve, and recharged their pistols.[4] Each rank did this in turn, until the whole force had discharged their weapons.

This system, which for a time worked well on account of the weight of fire secured by it, was soon neutralised by the custom which arose among the French cavalry, of charging upon them with a rush while they were carrying on their firing. A charge of this kind almost always resulted in the overthrow of those horsemen who depended entirely upon their pistols.[5]

The use of the lance having gradually disappeared, the pistol acquired a position better than it should, and from small

[1] Webster, word "Pistol." [2] Vanderburch, 175. [3] Bardin, 4430.
[4] Duparcq, ii. 68. [5] Ibid. 69.

causes the tactics of cavalry became vitiated to the last degree. Its great force was, for a time, lost or forgotten. The diminution of the pace of the charge to the trot, and the use of firearms in place of lance and sword, were the two causes that made it of but little use in war for a long period.[1]

The German Reitres were much more lightly armed than the heavy cavalry, and being mounted on faster horses, and using swords and pistols, they often, by their activity, defeated the French gendarmerie. They were of the type of the modern cavalry, but relied too much upon their firearms, which at that time were certainly no match for hand-to-hand weapons in a cavalry encounter.

The Germans were the first to use the deep formation in their cavalry, and it was copied from them by the French under Francis I. In the time of the Emperor Charles V. the German cavalry, armed with pistols, were ranged fifteen and sixteen ranks in depth, the French at the same time using the old formation in single rank, as in the days of knighthood. They, however, afterwards adopted the same formation.

According to La Noue, Charles V. was the first to form cavalry into squadrons, a custom that was soon adopted all over Europe, and has been in use ever since. The Emperor Napoleon III. in his work on artillery says that the Germans formed their squadrons in deep masses before the time of Charles V., and that he simply regulated a formation already in use.

Although Francis I. had increased the depth of the squadrons, the new formation was soon abandoned, and the French gendarmerie fought in single line, until about 1557–1558, when they were completely defeated by the heavy bodies of Spanish lancers at the battles of St. Quentin and Gravelines. At the battle of Dreux in 1562, the squadrons of Reitres overthrew the gendarmerie, and at this epoch the latter were obliged to renounce the single rank formation, which was a most unsatisfactory change to the French noblemen, who all wished to fight in the front rank.

Before the use of squadrons, the gendarmes as well as the light horse were ranged not in one single line, but in lines one behind the other, at intervals of about forty paces.[2] This was not a bad formation, as it enabled fresh lines or reserves to be continually coming into action. The light horse assumed the deep formation long before the heavy men-at-arms.

[1] Duparcq, ii. 71. [2] Daniel, i. 232.

Under Henry II. of France cavalry were formed in heavy squadrons of four hundred men each, formed upon ten ranks in depth and forty in front.[1] They were soon reduced to 200, still retaining the same depth. Afterwards under Henry IV. the depth was reduced to six ranks, and about 1633, the squadrons were placed in regiments, and were ranged in four or three ranks.[2]

According to the Cavalier Melzo, a custom was in use in the early part of the sixteenth century of ranging arquebusiers-à-cheval before the lancers. They fired upon the enemy, and when they had shaken their order by the fire, or when the enemy were approaching too closely, they retired through openings in the line, or around the flanks, and enabled the lancers to charge, followed by a line of cuirassiers who supported them, and pursued the fugitives in the event of success.[3] Behind these again were another line of arquebusiers-à-cheval.

This was soon followed by the practice of intermixing bodies of infantry musketeers with the cavalry. As the horsemen by this time had adopted the trot as the pace for charging, the musketeers were expected to keep up with them, and by their fire aid in breaking the ranks of the enemy. This, like most compromises, reduced the effective force of the cavalry, which could only be thoroughly attained by a charge at speed; and yet did not give the mixed force either the weight of fire, or the steadiness of formation which a well-organised body of infantry of the same strength would have had.

These facts all serve to show how completely the soldiers of that age misunderstood the real value and uses of a cavalry force—and how completely the invention of firearms had upset the whole principles of warfare.

At the battle of Pavia in 1525, the Marquis of Pescara used (for the first time) this system of intermingling infantry with cavalry.[4] The great mistake made by Francis I. was in charging with his heavy men-at-arms, into the midst of the imperial army, at a time when his artillery had checked their advance, and was just about driving them back in disorder.[5] He led his horsemen to the attack, and his movement at once masked the fire of the cannon. The imperialists rallied and attacked and surrounded him—1,500 Basque arquebusiers being employed by Pescara as skirmishers, to open a heavy fire against the French gendarmerie, heavy losses were inflicted on the horsemen, who could neither attack these

[1] Bardin, 2155. [2] Nolan, 16. [3] Bardin, 2155.
[4] Daniel, i. 233. [5] Nolan, 16.

musketeers, nor defend themselves from their fire. The French king ordered his men to open out, to lessen by that means the deadly effect of the bullets, but it was all in vain, for then the infantry penetrated their ranks, and killed great numbers of them.[1]

The king, after performing prodigies of valour, was taken prisoner, with many of his generals and officers. No victory could have been more decisive than that won by the imperialists, and it was supposed to have been secured by the fact of the infantry and cavalry being mixed together. As a matter of course that idea soon became general, so that for a time the practice of intermingling the services was adopted in most armies.

We constantly read in the accounts of battles after this time instances of the use of firearms among the cavalry, and of the placing of bodies of infantry arquebusiers in the intervals between the squadrons of horsemen.

At Dreux in 1562 we find squadrons of gendarmes and light cavalry placed in the intervals of the battalions of infantry.[2] At the battle of St. Denis in 1567, the Protestant arquebusiers withheld their fire until the cavalry had come within fifty paces, when they poured in a deadly volley with great effect.[3] This plan adopted by Coligny worked so well, that it enabled him to secure the retreat of his army.

The battle of Moncontour (1569) is important as showing the method of warfare at that period. At this time the German and Swiss infantry used the pikes only. The French infantry were principally armed with the arquebus, although some carried halberds and a few had pikes.

The French cavalry relied mainly on their lances, while the German Reitres depended on their pistols, and fought, as already described, in deep formation, firing by successive ranks. The Protestant general had coupled his French and German squadrons of cavalry together, in order that while one body used the lance, and the alternate one used the pistol, they would mutually support each other, and thereby gain the advantage of both the firearms and the lances. The increased feeling in favour of the use of the arquebus in aid of the cavalry, is shown by the arrangements of Coligny in this action, where, after mixing his corps of cavalry, as mentioned, he further supported them by arquebusiers, who being picked soldiers, were detached not to move (as was his usual practice) at the stirrup of each cavalier, but a little in front of them as skirmishers.

During the action the royal gendarmes were enabled by

[1] Liskenne, iv. 353. [2] Duparcq, Guerres de Religion, 69. [3] Ibid. 70.

the great weight and vigour of their horses to defeat the Protestant cavalry, who were more lightly mounted. Coligny restored the action by the fire of three regiments of French arquebusiers, whom he ordered to aim only at the horses, and whose efforts he supported by a charge of six cornets of Reitres. He would probably have gained the action but for the timely advance of the reserve, composed of Swiss infantry, which moved on in steady order under the command of Marshal Cosse.[1]

At the battle of Courtras, fought on the 20th of October, 1587, Henry IV. of Navarre adopted a new method of formation, based upon the prevailing idea of the time. The infantry were placed upon the wings, the cavalry occupied the centre, and the king placed small parties of arquebusiers-à-pied between the different squadrons of cavalry.[2] These parties consisted of twenty men each, in four ranks, five abreast. The front rank laid down, the second knelt upon one knee, the third stooped, and the fourth stood erect, so that they could all fire at once. They were ordered not to fire until the enemy's cavalry were within twenty yards, so that the aim should be well directed. They were men chosen for their bravery and steadiness, and the importance of their firmness was carefully impressed upon them.

The Royalist cavalry commenced to charge at a distance of 800 metres, and were pretty well blown before coming to close quarters. King Henry waited till they were within twenty paces, then the infantry poured in a volley, and the cavalry charged vigorously upon the disordered horsemen, and at once put them to rout.

An interesting cavalry action took place at the battle of Mookerheyde in Holland, on the 14th of April, 1574, between the Dutch troops under Count Louis of Nassau, and the Spanish army under Avila. The Spanish cavalry were drawn up with the mounted carbineers in the front rank, the lancers and German black Reitres in the rear. Count Louis charged with all his cavalry upon the enemy's horse, and soon drove the carbineers in rout and confusion before him; his men, however, having wheeled after their attack in order to reload their pieces, were promptly charged at speed by the lancers and cuirassiers, who had remained firm in reserve. This attack was made with great spirit, and at the proper moment.[3] After a short struggle Count Louis's carbineers were overthrown with heavy loss, and the fate of the day decided.

[1] Carrion Nisas, i. 510, 511. [2] Vanderburch, 17.
[3] Motley's Rise of the Dutch Republic, 558.

CHAPTER X.

EUROPEAN CAVALRY IN THE SIXTEENTH CENTURY.

SECTION I.—ITS ORGANISATION INTO DIFFERENT TYPES.

IN the last chapter was shown the growing tendency in the cavalry of relying mainly upon firearms as weapons of offence, and this feeling was soon followed by special organisations of cavalry based almost entirely upon the idea of making use of the arquebus, pistol, and carbine.

For a long period the cavalry had been of different types, the men-at-arms being the heavy, and the archers the light troops; but they were not separated in their organisation for many years, the archers being simply followers and auxiliaries of the gendarmes, in whose lances they were included. In Charles the Eighth's entry into Rome in 1494, we first see that portions of these light horsemen were banded together for tactical purposes.

ARGOULETS.—Louis XII. is said to have instituted a corps of light cavalry called Argoulets, who fought in a loose skirmishing order. They were lightly armed with a light cuirass, and cabasset to protect the head. They had as offensive weapons the sword, the mace, and the cross-bow, and afterwards the arquebus-à-rouet, which they were the first to adopt.[1] It was carried in a bucket, or boot of stiff hide fastened to the saddle.

Two thousand argoulets were introduced into the French army in 1499. They were raised in imitation of the light horse of the Venetian armies. The Albanian cavalry was another species of light horse, differing little from the argoulets.[2] It seems in fact that argoulet was the name given to a particular type of cavalry, and that the Albanian were of this type, but so called from being recruited in Albania.[3] This would account for the fact that the Albanian,

[1] Gay de Vernon, 12, 13. [2] Daniel, i. 167. [3] Bardin, 156.

Stradiot, and Argoulet horsemen are often confounded by historians.

ALBANIANS.—Charles VIII. took 8,000 Albanians into his pay in 1496.[1] Louis XII. shortly afterwards appointed a colonel-general to command them, and they became the nucleus and foundation of the French light cavalry. They were retained in the French army until the reign of Henry III., a squadron of them serving in the battle of Courtras under Marshal Joyeuse.

The Albanians formed companies of 300 or 400 men, and were altogether mercenary troops, furnishing their own horses. They were clad somewhat in the Turkish fashion. except the turban, and fought either on foot or on horseback. Their distinctive weapon was the arzegaye, a species of short lance, which they handled with wonderful skill.[2] It was ironed at both ends.

GÊNETAIRES.—Troops of this type were in use in many of the European armies at this time. In the Spanish forces they were known as gênetaires, from the Spanish word *gineta*, a short lance.[3] They had all the customs and paces of the Saracens or Moors. They formed the light cavalry of the Spanish army, and held the place of the hussars. They were clad, like the French Albanian cavalry, in the Turkish manner, using the arzegaye, and also the buckler. Their horses were small well-formed animals, still called in French and English *genets*, from the troops who formerly used them. They rode with short stirrups, and used the Moorish bit.

When firearms came into use the argoulets soon adopted the arquebus, and afterwards the escopette and the pistol. The term argoulet became one of reproach under Charles IX., and they are not mentioned after the battle of Dreux in 1562.[4] The carabins succeeded to them in the French army, and the old name was soon forgotten.

Another body of cavalry were the ARQUEBUSIERS-À-CHEVAL, a national force of French cavalry, who, armed with the arquebus, served as skirmishing or light troops to cover the flanks and aid the heavy cavalry, who were armed with lances. They served with the carabins and the dragoons, and differed from them mainly from the fact that the carabins were foreigners, and the dragoons simply mounted infantry.[5]

CARABINS were instituted first in France under Henry II. They were composed mainly of Gascons, Basques, and Spaniards, and used a short arquebus-à-rouet, a pistol, and

[1] Bardin, 156. [2] Daniel, i. 168. [3] Bardin, 2569. [4] Ibid. 232.
[5] Ibid. 340.

probably a sword.[1] They were the substitutes for the Argoulets and Stradiots, and formed a light cavalry for the army. They were first formed in regiments in the reign of Louis XIII.

DRAGOONS also came into use about this period. According to Père Daniel, the creation of this arm is due to Marshal de Brissac, who is said to have first used them in Piedmont.[2] Duparcq, however, gives the credit of the introduction of this arm to Pierre Strozzi, who in 1543, that is to say seven years before the wars which De Brissac carried on in Piedmont, placed 500 arquebusiers on horseback, in order to save them from fatigue, with the idea of their fighting on foot in case of need.[3]

Charles the Bold, however, had already conceived the idea, for he exercised his archers to dismount, and fasten their horses together, and to march quickly in order, preceded by pikemen, who, placing their pikes before them, knelt down and enabled the archers to shoot over their heads. When the arrows had thrown the enemy into disorder, the pikemen were instructed to charge upon them.[4]

The habit of taking infantry up *en croupe* was well known long before this period, and constantly employed in most countries. And, as already mentioned, Alexander the Great had invented dragoons, or at least employed them in the Dimachi (*διμάχοι*), which formed an important portion of his cavalry.

The French, however, seem to have been the first to have revived the use of dragoons, and the other powers seem to have copied from them, and to have adopted them in their armies.

The death of Henry II. at a tournament, and the consequent abolition of these exercises, had a very serious effect upon the use of the lance in the cavalry service. The difficulty of getting horses suitable for its employment, added to the great weight of armour, and the continual improvement of firearms, soon led to its entire abandonment, and cavalry began to use firearms almost exclusively.

From 1550 to 1553, the Marshal de Brissac employed companies of arquebusiers, which he placed on horseback to enable them to move more rapidly upon positions where their presence was required, and where they would be obliged to dismount to fight with advantage, his object being to supply in this way increased mobility to certain portions of his infantry. This was the real idea and object of dragoons, and

[1] Duparcq, ii. 72. [2] Daniel, ii. 354. [3] Duparcq, ii. 72.
[4] Ibid. 36.

seems to have been the first systematic use of this type of soldier in modern times.[1] Afterwards, under the reigns of Charles IX. and Henry III., the dragoons did good service, as well as under Henry IV.

Prince Alexander of Parma, as early as 1552, wishing to surprise the Duke of Alençon, mounted several companies of infantry upon pack-horses, and moved them rapidly towards the enemy.[2]

The dragoons, in the first place, were simply infantry mounted, and the horse was used solely for the purpose of rapid movement, the fighting being always done on foot. This gradually changed, the men being averse to dismount, so that they soon became accustomed to fight more on their horses than on foot, which after a time led to this arm falling into disfavour.

CUIRASSIERS. — The cuirassiers were another type of cavalry, somewhat like the German Reitres. They were first organised by Prince Maurice of Nassau in the wars in the Netherlands. Prince Maurice, who was one of the ablest generals of his age, and is recognised as one of the regenerators of the military art, was unable to procure the horses suitable for lancers, and the attack of that arm requiring open and firm ground, while the seat of war in the Netherlands was generally broken and enclosed, he considered the weapon useless, and abandoned it in his army.[3]

He organised instead a force of horsemen more lightly armed, but still protected by cuirasses, and armed with long-stock pistols, and cut-and-thrust swords. When charged by the Spanish lancers, Maurice had trained his horsemen to fire a volley, and then opening out quickly from the centre, to fall sword in hand upon the flanks of the advancing enemy. Being much more lightly equipped, and capable of more rapid movement, this manœuvre was generally successful.[4]

This was a variation from the practice of the German Reitres, who usually fell back to reload after firing. Henry IV. is said to have won the battle of Ivry in 1590 through the Reitres, in retiring after having delivered their fire, being unable to find openings in the second line through which to make their way to the rear. The result was that they rushed in confusion upon the main body of heavy lancers which the Duke of Mayenne was leading up to the charge, and throwing them into disorder, destroyed the solidity and force of their onset.

The cavalry organised by Prince Maurice were called

[1] Humbert, 81. [2] Beamish, 330. [3] Rocquancourt, i. 313. [4] Beamish, 328.

cuirassiers, from the cuirass, which was their principal defence.[1] They were a very effective body, and contributed mainly to his victories. This type of horsemen has been maintained with slight modifications in most of the armies of Europe down to the present time, the sword, however, assuming the principal position, the pistol being retained simply as an auxiliary weapon.

In the reign of Henry IV. of France there arose also the practice of attaching fifty *carabins* to each company of light horse (pistoliers or cuirassiers being then considered light cavalry). These carabins usually formed upon the left of the squadron under the orders of the captain of it, who gave them the signal to advance. They were accustomed to approach within 200 paces of a body of lancers, or 100 paces of a squadron of cuirassiers, and discharge their carbines by successive ranks, retiring rank after rank in rear of the squadron to which they were attached. If carabins were also in the ranks of the opposing force, they would skirmish in open order, to draw off the fire from the cuirassiers as they advanced to the attack.[2]

In fact it is almost impossible to enumerate all the various combinations that were used from time to time in the union of the different species of soldiers, in the method of using them in support of each other, and in the distribution of the weapons, &c. Every year almost showed variations and novel ideas, according to the notions of the different generals and officers who commanded armies or corps in different countries. It is only possible here to mention the more important and more striking combinations.

About the time of Prince Maurice we also see the word "cornet" applied to a tactical subdivision of cavalry. The strength of a cornet seems to have varied from 100 to 300 men. In Prince Maurice's instructions he speaks of one cornet containing 100 horsemen, and another 140, while D'Avila mentions the Duke of Mayenne having a cornet of 300 cavalry at the battle of Ivry.[3] The strength of cavalry was for a time enumerated by cornets instead of the old method of counting by lances. The name was derived from a cornet or standard carried by the corps.

In Stowe's Annals we read that at the battle of Zutphen, in 1586, Sir William Russell fought valiantly. "He with his *cornet* charged so terribly that when he had broke his lance, he with curtle-axe so played his part that the enemy reported him to be a devil and not a man, for where he saw six or seven of the enemy together, thither would he, and so behave

[1] Beamish, 329. [2] Daniel, i. 169. [3] Beamish, 325.

himself with his curtle-axe that he would separate their friendship."[1]

Under the ordnances of the Emperor Charles V. there were reckoned in a cornet 60 lancers heavily armed, 120 cuirassiers (or demi-cuirassiers), who were armed with the breastplate only, and 60 light horse, armed with long arquebuses. This formed virtually a regiment consisting of three troops or squadrons of different species of cavalry. He also had the advantage of having in his armies the national light cavalry of Spanish origin already referred to, the *gênetaires*, who, somewhat analogous to the hussars of the kings of Hungary, became the model for the creation of corps of light cavalry in other nations.[2] They were organised in *escarres* or squadrons. Regiments were also organised in Spain earlier than in other countries.

In Hungary appeared the *hussars*, a light cavalry of a very formidable character. They were at first a species of militia, or arrière-ban, being instituted about the middle of the fifteenth century, by an ordnance which obliged every twentieth man to take the field. These horsemen were called "hussars" from the Hungarian *huss*, which means the twentieth, and *ar*, pay.[3] Père Daniel describes their armament, and from him we learn that they used large swords, either straight or curved, and worn on the waist, while some of them carried long, straight, thin swords, intended mainly for thrusting. Their movements at this time were very irregular, and consisted mainly of skirmishing in loose swarms around the enemy. They managed their horses very skilfully. Their saddles were of very light wood, and placed upon blankets folded. Over the saddles were worn skins, with the fleece outwards, which covered the pistols and housings. The horses were ridden with bridoons instead of bits, so that they could pasture at the shortest halt without unbridling. These troops were well suited for foraging, reconnoitring, and outpost service. They have been maintained down to the present time with but few slight alterations in dress and arms. Light cavalry dressed and armed after the fashion of the Hungarian hussars have been organised and maintained in nearly all the European armies for many years past.

The Turkish cavalry at this period had attained a high reputation; they were essentially light cavalry, and relied mainly upon the curved sabre, or cimeter. They fought in loose order, and by very irregular evolutions. They were

[1] Stowe's Annals, folio edition of 1615, p. 736. [2] Bardin, 3485.
[3] Beamish, 323.

armed with cuirass and casque, and used bows and arrows as well as the sabre.[1] They did not stand the direct charge, but, as was their custom in all ages, gave way before an impetuous attack, to return again to harass the flanks, and to wear out their foe by constant skirmishing.[2] They were long considered to be the best cavalry in Europe. They were accustomed to form in the shape of a wedge, in order to pierce the ranks of their foe, and once they succeeded in breaking the order, they scattered, and mingled in the *mêlée*, in which their wonderful dexterity in the management of their sharp cimeters gave them a great advantage.[3]

Their horses were not large, but were spirited, and well trained and bitted. With the exception of the saddle, their equipments were light. The lance, although sometimes used, was not a favourite weapon with them, as it was not useful in the *mêlée*.[4]

The Turks did not wear heavy armour, and the consequence was, that, being lightly armed, and mounted on active horses, they displayed a wonderful activity in the use of their weapons in a hand-to-hand fight. It was this quickness that made them such excellent light cavalry, but rendered them unfit to sustain the shock of horsemen heavily armed, charging with serried ranks, and in good order.[5]

The Turkish cavalry was composed of Spahis, or regular horsemen, and volunteers, the latter of various types. The Spahis were armed with lances, javelins, and sabres. Some also had carbines, others bows and arrows. The European Turks made use of firearms before they were much used among the Asiatics. After pistols were invented they carried them, both in holsters on the saddle and in the waist-belt or girdle. Coats of mail, of light construction, were often used among them during the seventeenth century.[6]

The Turks maintained many advanced posts of cavalry in front, in rear, and upon the flanks of their positions, and their outpost work was generally very fairly performed.

A great battle took place on the 29th of July, 1526, at Mohacz, or Mogatch, between Soliman "The Magnificent," Sultan of Turkey, and the Hungarian army under their king, Louis II. It was principally a cavalry action, and is of importance as showing the result of a conflict between the heavy armed Hungarians and the more lightly equipped Turks. Soliman's army consisted of 200,000 men, while the King of Hungary had but 30,000, many of them being

[1] Lamartine's History of Turkey, ii. 315. [2] Humbert, 70.
[3] Nolan, 29. [4] Ibid. 25. [5] Montecuculi, 221.
[6] Warnery, Remarques sur le Militaire de Turcs.

heavy armed knights and nobles, whose solid and impetuous charge nothing in the Turkish ranks could attempt to withstand.

Soliman's plans evinced great skill. His army was ranged in three lines—the army of Asia, under Ibrahim, forming the front line; the army of Europe, under Kosrew Pasha, forming the second; while the Sultan in person, with his janissaries, or guards, took up a position in rear, on an eminence, as the reserve.

The front line were ordered to open before the charge of the Hungarian squadrons to avoid the shock, and to endeavour to attack them in flank and rear as they passed. The Hungarian cavalry, under the command of a Bishop named Tomori, attacked in a splendid charge, and swept through the front line, which at once gave way before them, but coming blown and disordered upon the second line, they were checked, and, being attacked on both flanks and rear by the first line, were annihilated. This charge was immediately followed by the advance of the king, with the bravest of his knights and heavy horsemen, who burst through both lines beneath a cloud of arrows, and penetrated to the hill, upon which Soliman and the janissaries, 30,000 strong, were waiting in reserve. Then the batteries of cannon opened upon the Hungarians in flank, and destroyed many of them. The survivors, however, did not lose heart, but still rode boldly onwards, mounted the eminence, and attacked the Sultan himself. A group of pages and eunuchs gave up their lives to save him; already the knights were near enough to strike his cuirass with their spears, when a body of janissaries ran up, and, by violent exertions, saved the monarch, and struck down his assailants. The Hungarian army by its bold attack was in the midst of an overpowering enemy, being entirely surrounded by the two armies of Europe and Asia, the cannon of the batteries, and the heavy masses of the janissaries. The artillery cut them to pieces, the light horsemen struck them down in attempting to get away, and those who escaped the sword died in the marshes, where, fleeing for safety, they and their horses were suffocated or drowned. The unfortunate King Louis so lost his life, and his body was never recovered.[1] The loss of the Hungarians was enormous.

SECTION II.—SPANISH CAVALRY IN MEXICO AND PERU.

We will now turn our attention from the East to the West, and briefly refer to the operations of Cortez in

[1] Lamartine's History of Turkey, ii. 315, 316.

Mexico, where the presence of a mere handful of cavalry exercised as important an influence as can well be imagined. The circumstances of the conquest of Mexico, particularly of the services rendered by the few horsemen who accompanied Cortez, are of great interest from the fact that the mounted men were there used, for the first time on record, against organised armies of soldiers who had never seen or heard of horses.

The Mexicans were not altogether ignorant of the military art. They had armies fairly organised and well drilled, and appear to have had an institution somewhat similar to the order of knighthood. Admission to this order was the reward given by the Aztec princes for martial prowess, and entitled the recipient to wear ornaments on his arms and person.[1]

The dress of the officers was magnificent. The principal defence was a light tunic of quilted cotton, so thick as to serve as a protection against the light missiles of Indian warfare. Instead of this, and sometimes over it, the wealthier chiefs wore cuirasses made of thin plates of gold or silver, over which was thrown a surcoat of gorgeous feather work. The helmets were of wood or silver, fancifully decorated with brilliant plumes, gold ornaments, and precious stones. Collars, bracelets, and earrings, of the same rich materials, were also very much used.[2]

The armies were divided into bodies of 8,000 men, and these again into companies of three or four hundred men, each under separate commanders. Each company had its banner, as also had each division of 8,000, while the commander-in-chief of the whole army displayed the national standard, which contained, in gold embroidery and feather-work, the armorial ensigns of the state.[3]

Their tactics were simple, and yet somewhat advanced They were proficient in ambuscades, surprises, and all the ruses of guerilla warfare. They advanced in battle in admirable order, singing and shouting their war-cries. The discipline was strict, disobedience of orders being punished with death. Their weapons were slings, bows and arrows, javelins, and darts.[4]

Such was the military system of the populous, wealthy, and warlike nation that Cortez, the Spanish cavalier, set out to conquer. The force at his disposal amounted to 110 mariners, 553 soldiers, including thirty-two crossbowmen and thirteen arquebusiers. He was also provided with ten

[1] Prescott, Conquest of Mexico, i. 24. [2] Ibid. i. 25. [3] Ibid. [4] Ibid. 241.

heavy guns, four falconets, a good supply of ammunition, and sixteen horses, which had been transported with great difficulty, and at enormous expense. Such was the paltry force at his disposal in setting out on a career of conquest that reads more like an extract from an extravagant romance than a page of authentic history.

The first great battle took place at Tabasco, on the 25th March, 1519, when, with his small army, Cortez won a decisive victory over an Indian force of 40,000 men, drawn up in five divisions of 8,000 each. Cortez directed an attack on the enemy's position in front, with the main portion of his men, aided by the fire of the artillery, while he made a detour himself and fell upon their rear with the sixteen horsemen who formed his small cavalry contingent. The attack was bravely resisted in front, and the battle was continued for more than an hour, the Spaniards being sorely pressed by the immense hordes of Indians which swarmed around them. Soon, however, a tumult and confusion arose in the rear of the enemy's lines, and over their heads were seen the Spanish chivalry, their horses dashing and plunging through the thickest ranks, their war-cries sounding loud and clear, and their sabres flashing in the morning sun as they delivered crushing blows in every direction.[1]

This sudden charge of sixteen horsemen virtually defeated an army of 40,000 brave soldiers, till then gallantly striving, and with some success. The surprise, the attack in rear, the monstrous apparition of mounted men, so new and so fearful a sight, caused a panic to seize the whole mass, and the main Spanish line charging, the entire force threw down their arms and fled from the field.

It is a curious fact, and is corroborative of the usual explanation of the origin of the fable of the Centaurs, that these poor Indians, seeing the mounted men, believed the horse and his rider to be one and the same animal.[2] They were naturally intensely terrified at the sight of them.

The next fighting took place with the Tlascalans, the people of a small republic, which lay between Mexico and the sea. Their military system was somewhat similar to that of the Aztecs. A species of feudal tenure is said to have existed among them, as well as an order of knighthood, in which the neophyte watched his arms in the temple for fifty or sixty days, then listened to a grave discourse on his new duties, when his arms were restored to him. In the actions with these people the small force of horsemen mainly contributed to the Spanish success, the firearms and cannon

[1] Prescott, i. 156. [2] Ibid. 157.

also having a very important influence. The Tlascalans in the action which took place on the 5th September, 1519, were in great strength, their army being drawn up in five battalions of 10,000 men each.

The common soldiers in their ranks were almost naked. They were armed with bows and arrows, slings and javelins. They could discharge two or three arrows at a time with good aim. The most dangerous weapon was a javelin, with a thong to withdraw it after throwing it.[1]

The chief warriors wore the quilted cotton mail, which was adopted by the Spaniards. It was about two inches thick, and was a tolerable defence against light missiles. Over this it was that the wealthier officers wore the cuirasses of gold and silver. The discipline, the bravery, and the steadiness of Cortez's little band, aided as it was by firearms, horsemen, and artillery, gained the victory after most desperate fighting.

It would take up too much space to follow further the operations of Cortez, and those of Pizarro afterwards in South America. We have simply referred to the war as an important episode in the history of the cavalry service, and having described the arms, armour, and organisation of the Indians of that day, may conclude by saying that the horsemen, from the commencement to the end of the struggle, formed the most valuable portion of the invading armies.

[1] Prescott, i. 241.

CHAPTER XI.

CAVALRY IN THE "THIRTY YEARS' WAR." GUSTAVUS ADOLPHUS, TILLY, AND WALLENSTEIN.

SECTION I.—GUSTAVUS ADOLPHUS.

IN the Thirty Years' War the military art went through several phases of development, Gustavus Adolphus, King of Sweden, the great central figure of that conflict, having been the most noted military reformer of modern times.[1] In fact, he made a greater progress in tactics and the military art generally than any commander before or since his time. He was, practically, the creator of a new art of war, which, in its essential points, subsists to the present day. His appearance on the European stage marks therefore a distinct and important epoch.[2]

Gustavus Adolphus belongs to a type that appears but rarely on the pages of history. He was well educated, thoroughly acquainted with the military institutions of antiquity, and understood fully the principles upon which Alexander, and Hannibal, and Cæsar won their imperishable renown. He was a great innovator upon the military systems of his time, and although some of his changes were real novelties, most of them were rather the result of an intelligent recurrence to the ideas of the ancient masters than, properly speaking, new inventions.

He improved the discipline of the army very materially, and was the first to introduce the order and regularity which are so important elements of success in military operations. He originated the idea of clothing the soldiers well in uniform dresses, according to the divisions to which they belonged. Up to his period the soldiers were clad in every variety of costume that individual caprice dictated; and armies were usually composed of ragged and insubordinate mercenaries. Tilly's doctrine, "a ragged soldier and a

[1] Beamish, 334. [2] Decker, 36.

bright musket," shows the general opinion of the age on the point. By having his soldiers well clad, Gustavus rendered his army more capable of enduring the vicissitudes of the climate and improved the *esprit du corps* and the general appearance of his troops.

It was customary at this period to form the infantry in battalions ranged in massive squares or oblongs, the centre being composed of cuirassed spearmen or pikemen, while they were surrounded in front and flanks by musketeers. This formation was the legitimate outcome of the system of mingling musketeers and pikemen, to which we referred in the last chapter. The use of firearms had become so general, and was so much relied upon to decide the fate of battles, that the cavalry as well as the infantry depended mainly upon those weapons. The traditions of the former prowess of the horsemen, however, as well as the yet incomplete state of the musket, which was loaded slowly, and which carried with little precision, rendered necessary a force of pikemen who, armed with breastplates as a defence against the pistol shots of the cavalry, could oppose with their pikes an impassable barrier to the advancing horsemen. Again in charging positions, when the battle closed to "push of pike," the pikemen of the opposing sides came to the front and charged with levelled weapons.

The system was based upon the heavy and unwieldy phalanx of the Greek armies. Gustavus Adolphus, with that clear-sighted genius which was his distinguishing characteristic, saw that a system well suited to an age that was unprovided with missile weapons of either range or force, was most unsuited to his time, when projectile weapons of great power had been invented, and had partly superseded the "*armes blanches.*" Cannon also were being much more used upon the field of action, and were assuming a very important position in armies, and the carnage inflicted by artillery upon the heavy masses of infantry was another reason that induced him to change its formation.

Imbued with the military principles of antiquity, he formed his troops upon the model of the Roman Legion, not in a slavish manner, but by adapting the idea to the circumstances of his age, and the altered conditions of warfare.[1] He reduced the enormous regiments of 2,000 and 3,000 men, to 1,200, and afterwards to 1,000, and relied more upon freedom of action and rapidity of movement than upon clumsy and unwieldy strength.[2]

He reduced the depth of the infantry from twelve to six,

[1] Chapman, 91. [2] Beamish, 335.

separated the pikemen from the musketeers, and formed them into small bodies,[1] so that they should be more movable, and better able to support each other. By the reduction in depth of the ranks, he secured a greater front, and a heavier fire of musketry, while cannon had less opportunity for destructive fire. The divisions were so drawn up that the musketeers could file out between the intervals of the spearmen, and again fall back like the Roman *velites* through the same intervals, when the pikemen came to close quarters. The pikes were shortened from eighteen to fourteen feet, and the most cumbrous part of the armour was done away with.

Gustavus Adolphus has also the credit of inventing the column, as well as the custom of the front rank kneeling to fire, and the system of firing by platoons.[2] He introduced portable leathern artillery, and the use of cartridges, to carry which he supplied his men with pouches and abolished the bandoleers. He increased the proportion of officers to the men, in order that the whole and every part of his army should be brought under complete and effectual command.[3] He lightened and improved the musket, and did away with the rest or *fourchette*.

Another important principle that we first see employed by the Swedish king was the combination and mutual support of the three arms, using each in its proper sphere, but in connection with the others.[4] He formed his troops in two or three lines ranged parallel one behind the other or *en échiquier*, the cavalry behind the infantry to sustain it or upon the wings to be applied in mass, the artillery distributed upon the best positions along the line, to sustain the infantry and cavalry.

In the Polish war Gustavus lightened the muskets. They were mostly match-locks, which long maintained the preference over the flint-locks then beginning to come into use, but which were at first badly constructed and very clumsy. The musketeers at this time often carried pointed stakes, called "hog's bristles," or Swedish feathers. They were stuck in the ground a few paces before the line of infantry, inclining outwards, and formed a defence, against a charge of cavalry, for the musketeers who maintained their fire under the cover of them.[5] This, it will be remembered, was simply a renewal of the expedient used by the English archers at Agincourt. These pikes were only used for a very short period. The side-arm of the musketeer was the sword, his only defensive armour the helmet. The pikemen used cuirasses and thigh-pieces, and carried also swords or axes.

[1] Mitchell, 153. [2] Beamish, 335. [3] Chapman, 92.
[4] Decker, i. 36, 37. [5] Chapman, 93.

The pikeman, in receiving the charge of cavalry, held his weapon in a slanting position, with his left hand staying the butt against his right foot, while in his right hand he held his battle-axe, or drawn sword. It is a curious circumstance worthy of mention, that in the year 1628 Gustavus had 3,000 bowmen in his army. During the Polish war, there was in the Swedish army a corps that marched on snow-shoes, and was used as a corps of observation when deep snow prevented regular operations. In this connection it may be stated that the troops of the British army stationed in Lower Canada have always been trained to march in heavy order upon snow-shoes.

Gustavus Adolphus was also a great reformer in the cavalry service, and may be said to have been the first to appreciate the true uses of that arm in the position in which it was placed under the system of modern warfare. His ameliorations were very important, not so much in the arms and equipment, as in the tactical method of using it.

When he came upon the scene the cavalry tactics of the age were of the clumsiest and slowest type. The squadrons were large, the men heavily armed, and moving at slow pace, they relied mainly upon their muskets and pistols. The charge at speed was unknown. Gustavus organised his cavalry into regiments, consisting of eight troops, each containing about 70 men; the regiment therefore, when full, having a strength of about 560 men.[1] These regiments were formed four ranks in depth, and afterwards in three, which was a great reduction from the massive formation in use before his time. The weight of the cavalry appointments was also lessened as much as possible. He retained only the cuirass and helmet in the heavy cavalry, the light cavalry wearing no defensive armour.[2]

He suppressed the caracoles and half wheels, and half halts which were commonly practised in his time in order to draw the fire of the enemy before riding closely up, and ordered his troops to ride boldly up to the enemy's line, when the front rank, firing a single volley with their pistols, were to draw swords and dash in among the troops opposed to them, the second and third ranks generally reserving their fire, to be used when the enemy's line was broken.

It was in the hand-to-hand combat that Gustavus taught his cavalry to be famous. He wished them to depend upon the keen edge of the sword, and the shock of the charging men and horses, and he was therefore the first to revive the

[1] Chapman, 95. [2] Fonscolombe, 51.

ideas of Alexander and Hannibal, and to introduce into modern Europe the true principles of cavalry tactics.[1]

Gustavus is generally reported to have mixed his infantry and cavalry in the manner of the ancient Romans. Schiller says he made up for his want of cavalry by mixing infantry among the horse, and says that this practice frequently decided the victory. It seems, however, that writers have misunderstood his tactical arrangements, and have thought that he mixed up the different arms, when he simply combined them judiciously, to enable them mutually to support each other. His evident desire to give his cavalry more freedom and greater mobility, to rely mainly upon their dexterous use of hand-to-hand weapons, seems to contradict the notion that he would ever have hampered and clogged the movements of his horse, by mixing bodies of infantry among them. We can easily understand his placing his infantry and cavalry alternately in the line of battle, or "*en échiquier*" with artillery interspersed along the line. In fact, we know this was his constant practice. When an advancing enemy had been well shaken by the fire of cannon and musketry, he then launched out his cavalry through the intervals at the charge, to fall upon the disordered masses of the foe. That was however a very different species of tactics to the method used before his time of mixing the arms, and making them move and work together at the same pace. Gustavus evidently appreciated too well the value of the speed and weight of the horse, to take from his cavalry their greatest advantage, and to tie them down to the slowness and torpidity of an auxiliary force of infantry.[2]

In the Swedish army the cuirassiers, or heavy cavalry, were armed with the helmet and cuirass, a long sword, and two pistols.[3] The dragoons or cavalry of the line wore the helmet only as a defence, and carried the long fusil or musket, and a sword. They were at this time used more as cavalry than as mounted infantry, which was the original object of their organisation. The light cavalry wore no defensive armour whatever. The heavy cavalry was generally held in reserve to sustain the army, and the third rank generally formed a support to the other two. Gustavus is also said to have attached small pieces of light artillery to the regiments of cavalry.[4]

[1] Chapman, 97. [2] Mitchell, 154.
[3] Fonscolombe, 51; Decker, i. 37; Humbert, 8.
[4] Humbert, 90.

SECTION II. — CAVALRY OF THE IMPERIAL ARMY— BATTLES OF BREITENFELD AND LUTZEN.

The cavalry in the armies of Tilly and Wallenstein consisted of cuirassiers, carbineers, dragoons, hussars, and Croats.[1] The cuirassiers were all armed with heavy defensive armour, and were mounted upon large and powerful chargers. They were drawn up by Tilly ten ranks in depth, and by Wallenstein in eight. They could move but slowly, and depended much upon their firearms.

The carbineers were used much in the same way, riding up and firing by successive ranks and retiring to reload. The dragoons, who used long muskets, sometimes fought on foot, but generally fought much upon the same principle as the heavy cavalry. The light cavalry were drawn up in a shallower formation, Tilly ranging them six in depth, and Wallenstein five.

The hussars were very handsomely clad, their uniforms and trappings being all richly decorated. The most important body of light cavalry in the Imperial armies was composed of the Croats, who formed an irregular force of great value. Their principal use was in surprising convoys and baggage, cutting off communications, &c. They were not treated as other troops in capitulations and surrenders, for they were usually excluded, and cut down as heathen barbarians.[2] We read of a sharp conflict between 4,000 men, principally Croats, under Colonel Spar at Burgau, and a detachment under Gustavus Adolphus, in which the Imperial cavalry were thoroughly routed by the Swedish troops.[3] This action had a most demoralising effect upon these irregular horsemen.

The two most important battles of this age were those of Breitenfeld, or Leipzig, in 1631, and Lutzen in the following year; and in both actions we find the cavalry service reviving and again beginning to exert an important influence upon the result of battles.

At Breitenfeld, the Imperial army, 35,000 strong, occupied a rising ground on the plain. Tilly, the commander-in-chief, occupied the centre, while Furstenburg commanded the right, and Pappenheim, the boldest cavalry officer in the Imperial forces, commanded the left. The army was drawn up in one line of great depth, the cavalry upon the wings, the artillery ranged upon a hill along the rear of the line.

The Swedish and Saxon army advanced in two columns, having to pass a small rivulet near Podelwitz in Tilly's front.

[1] Beamish, 336. [2] Mitchell, 160. [3] Ibid. 227.

In order to defend the passage of this stream the battle was begun by a charge of 2,000 cuirassiers, led by the fiery Pappenheim, upon the van of the Swedish army, which consisted of three regiments of Scottish Infantry. The Scots had some advantage of ground, and, being supported by a body of dragoons, drove back the enemy.[1] Pappenheim soon rallied his troops and attacked the flank of the advancing Swedes. General Banner immediately wheeled the leading divisions to the right, and held the opposing cavalry in check, while the king was drawing up the army in battle array.

The cuirassiers, being repulsed, retreated so precipitately back to their lines that they left the Holstein regiment of infantry, which had been despatched to their assistance, alone upon the plain, subject to the onslaught of the pursuing Swedish horsemen. Their heavy and unwieldly tactics here proved very faulty. They formed square with the pikemen, by some oversight or mistake in the centre, surrounded by musketeers who were at once cut down by a charge of the Finland cavalry. The spearmen, although able to defend themselves against the horsemen, were attacked by two companies of Swedish musketeers and completely routed, their colonel, the Duke of Holstein, being slain.[2]

The king's army, 20,000 strong, then formed for action, inspirited by the result of this preliminary skirmish. It was drawn up in two lines and a reserve. Gustavus commanded the right wing himself, General Horn commanded the left, and Teuffel the centre.

It is said that Gustavus in this action had a reserve of artillery, being the first instance of the kind in history. The main action began by a desperate cavalry combat which took place on the right of the Swedish army, where Gustavus Adolphus and Pappenheim, at the head of the rival masses of horsemen, charged furiously against each other. After close hand-to-hand fighting, Pappenheim and his heavy cuirassiers were driven headlong from the field. Gustavus, wheeling from the pursuit, captured the Imperial artillery and turned their fire upon the heavy masses of his infantry in the centre.

In the meantime, Furstenburg, at the head of the Imperial right wing, had defeated the Saxon army of allies, which was formed upon the Swedish left, and drove them, completely beaten, in confusion from the field. Tilly could not restrain his troops in the pursuit, and Gustavus, taking advantage of their absence, attacked the uncovered flank of the enemy's

[1] Mitchell, 189. [2] Ibid. 190.

centre and routed it. Furstenburg soon rallied his victorious troops, and returned with about 8,000 men to fall upon the Swedish left. The second line was moved up to support the flank and placed *en potence*, and the reserve also arriving to their assistance, the battle was restored in that part of the plain. By this time the day was fast waning. The Imperial centre was broken, its left wing driven from the field, and the victory was almost won. The fighting was however gallantly maintained by the Imperial cavalry. Four troops of cuirassiers at this crisis charged up to the very heads of the Swedish pikes, and, with their pistols, picked off every ensign in Lumsden's regiment; but it was all in vain. The Swedes doubled their front by moving up the three rear ranks between the three front, so that the infantry assumed a formation three deep, and the first rank kneeling, the second stooping, and the third standing erect, they poured in a heavy and well-sustained fire, while the cavalry attacked the flanks and rear of the veteran troops which still maintained the fight along the enemy's position.[1]

It was a most decisive victory; the loss in Tilly's army being enormous, both in killed, wounded, and prisoners.

No one can read the details of this battle and compare them with the particulars of the battles of Pavia, Mohacz, Moncontour, Courtras, &c., fought in the preceding age, without being struck with the great development of the art of war in a short period. In Breitenfeld we first see a battle fought upon the same general principles as are in use at the present day. The combination of the three arms is clearly shown, the revival of the cavalry service plainly foreshadowed, and the tactical manœuvres of Gustavus in guarding his wings are superior to anything of the sort since the palmy days of the military art among the Romans.

Lutzen, fought shortly after, on the 6th November, 1632, between Gustavus Adolphus and Wallenstein, was very similar to Breitenfeld in the principles of the tactics employed in both armies. The Imperial army contained about 17,000 men at the commencement of the action, which was increased to 27,000 during the engagement by the arrival of Pappenheim at the head of 10,000 men. It was drawn up in two lines with a reserve, and Wallenstein had strengthened his position by loopholing and occupying some walled gardens on his right front, and by deepening the ditches on the road and lining them with musketeers.[2] The Swedish army, 20,000 strong, was ranged upon two lines; the infantry six deep; the cavalry, according to some writers, three deep,

[1] Chapman, 263. [2] Ibid. 372.

although Harte in his History of Gustavus Adolphus says that at this period it was his custom to draw up his cavalry four ranks in depth.[1] The infantry occupied the centre, the cavalry the wings; a reserve of infantry, under Colonel Henderson, was placed in the centre between the two lines, and in rear of the centre a separate cavalry reserve was posted under the command of Colonel Oehm.

The battle was commenced with a general attack by the Swedish line upon Wallenstein's position in which the high road was carried, and the batteries beyond it captured by the infantry brigades of the centre of the king's line.[2] Being unsupported in time, however, by their cavalry, which had been delayed by the obstructions of the ground, they were obliged to fall back.

The brave Swedish king, at the head of the cavalry of his right wing, had already attacked and dispersed the lightly mounted Poles and Croats, who were posted on the enemy's left, and their disorderly flight had carried confusion among the remainder of the cavalry. At this moment he was informed of the repulse of his infantry in the centre, and committing to General Horn the conduct of the pursuit of the hostile horsemen, he at once led the regiment of Steinbock cuirassiers to the support of his centre and left, which were being hardly pressed. He outstripped his followers, and arriving at the decisive point, rode forward to reconnoitre the best place to attack. Unfortunately he advanced too close to the enemy's ranks, and was wounded in the left arm. Soon after, a second shot brought him down from his horse, and a body of Croats, charging, killed him as he lay mortally wounded upon the ground.[3]

The Swedes, inflamed with rage at the loss of their dearly loved monarch, attacked with such fury that the whole Imperial army was being pressed back at every point, and the victory was almost decided. At this important crisis, Pappenheim, the fiery cavalry officer, the hardest fighter in the Austrian service, appeared upon the field with his cuirassiers and dragoons. He was at Halle, a considerable distance from the field of battle, the evening before, when he received a despatch from Wallenstein to hurry up with all speed to the scene of action. On receipt of the order, his men were engaged in sacking the town. He instantly sounded "to horse," and set out at speed at the head of his cavalry, ordering the infantry and artillery to follow as fast as they could be got together.

His arrival in the battle at once changed the aspect of

[1] Beamish, 339. [2] Chapman, 375. [3] Schiller, 238.

affairs. He rallied the fugitives, and led them again to the charge, aided by his own horsemen. His impetuous bravery carried him furiously into the thickest of the Swedish ranks; his example inspired his men, and inflamed their courage, so that all went down before them. Wallenstein rapidly availing himself of the favourable moment, re-formed his line, and leading it again to the charge, the Swedes were driven back with enormous loss, and the twice captured cannon were again taken from them. Piccolomini and Tersky ably seconded the efforts of Pappenheim, the Swedish regiment of Blues being cut down after a desperate fight by Piccolomini's cuirassiers. Seven times did that gallant cavalry leader charge, six times was he wounded, and seven horses were shot under him before he was carried in the general rout off the field. Wallenstein was hit several times, while Pappenheim, the only cavalry leader of Germany who could be compared with Gustavus Adolphus, had his gallant spirit stilled for ever, upon the same field that had been so fatal to his great rival.

The death of Pappenheim ended the good fortune of the Imperial army. He had blazed across the struggle like a meteor brightening their prospects, and lighting them on to victory: when he fell, it was as if the sun had gone down, and the dejected cuirassiers fled from the field of battle in blank despair.

The Swedes, again rallying, threw the remains of the first and second line into a single one, and made a final and successful charge, when night coming on, put an end to one of the most sternly contested and bloody battles that has ever been fought.

The influence of the cavalry in this action is very marked, and is a proof of the great value of the reforms effected by Gustavus Adolphus in the method of employing it. One of the great reasons, however, that caused its increased influence, was evidently the extraordinary capacity of the Swedish king as a cavalry commander. The impetuosity of Pappenheim's disposition also affected the operations of the Imperial cavalry very materially.

How different was the battle of Lutzen from the battle of Bouvines, with its boasted chivalry, with its Count of Boulogne, and his circle of pikemen! How different from the bloodless battles in Italy, with their iron-cased soldiers, their clumsy manœuvres, and their losses by suffocation in the mud!

Something had put a bolder and more gallant spirit into the leaders of this age. The Duke Bernard of Wiemer took

the command after the death of the king, and his prompt decision of character at that crisis is deeply marked upon the pages of history. Retreat was suggested to him. The fiery duke answered that it was a question of vengeance, not of retreat. He then assumed the command, and ordered the lieutenant-colonel of the Steinbock regiment to advance. He hesitated to obey the order, and was at once run through the body by the impetuous Bernard, who, placing himself at the head of the regiment, led a victorious charge.

The outpost and reconnoitring service was fairly performed in these wars. Patrols were used very freely, and were sent to great distances in every direction. When the enemy was far removed, the patrols were smaller in number, consisting of one sub-officer and six or seven men. When the armies were closer to each other, the patrols were larger and more numerous. The reconnoitring parties then consisted of an officer and about twenty men in each.[1]

Information was obtained by spies, and by prisoners who were always closely questioned when captured; and the small parties of cavalry were always on the watch for couriers carrying despatches, from which, of course, the most useful information could be obtained.

[1] Duparcq, ii. 150, 151.

CHAPTER XII.

CAVALRY IN THE WARS IN ENGLAND BETWEEN CHARLES I. AND THE PARLIAMENT.

THE great Civil War in England, 1642 to 1650, produced some very able cavalry leaders and the mounted service was skilfully handled, and exercised a most important influence upon the result of the battles. Cromwell the great cavalry general of the Parliamentary army, had as much downright solid energy as Gustavus Adolphus, and as much impetuosity in leading a charge as his celebrated opponent, the fiery Prince Rupert; while his shrewd common sense, and his iron will, made him one of the greatest rulers and soldiers that ever lived. A plain country gentleman, forty-four years of age, without military training or experience of any kind, he raised a regiment of cavalry at the commencement of the war for the Parliamentary service, which, distinguished above all in the army for steadiness as well as brilliant gallantry, was soon known by the *soubriquet* of "The Ironsides." Within three years this country gentleman was commander-in-chief of the army, and within ten years was the most absolute ruler that ever swayed the destinies of England.

Prince Rupert, with equal, if not greater impetuosity than Cromwell, lacked the prudence and caution required in any important command. The energy of these two officers imprinted a character upon the cavalry operations of the war, very different from that of former ages. The dash and vigour of the cavalry charges rendered them equal to the feats of the horsemen of Gustavus Adolphus and Pappenheim. The cavalry were organised into cuirassiers and dragoons; the pistol and sword being the principal weapons of the former, while the latter carried muskets.

The first conflict of the war was a skirmish between a small party of cavalry, under Prince Rupert, and a body of the rebel horse, under Colonel Sandys. The Prince no sooner saw the enemy than he charged at full speed as they

were defiling from a lane. The sudden onslaught gave him the victory. This exercised a great moral influence over the future operations, and gave a high reputation to the Royalist horse, which the "Ironsides" alone were able to wrest from them.[1]

At the battle of Edge-hill, in 1642, the Royalist cavalry, on both wings, defeated the horse opposed to them, but pursued the fugitives so far that, before they returned, the centre of the King's army had been badly handled by the rebel infantry. Prince Rupert throughout the war seems to have failed to learn the importance of keeping his men in hand, and of remembering always to reserve his command to be applied at the decisive points, at the critical times when required.

The combats of Grantham and Gainsborough were decided by the cavalry. In the first action the opposing dragoons fired at each other for about half an hour, when Cromwell led his horsemen on at the charge sword in hand. The Royalists injudiciously awaited the shock standing, and as a matter of course, were driven off the field in headlong rout, and pursued for miles with heavy loss.[2]

At the battle of Gainsborough, Cromwell, who had been skirmishing with the advance of the enemy, drove them over the crest of a hill, and came suddenly upon a very large body of horse, who were advancing to take him by surprise. Holding back three troops, under Major Whalley, as a reserve, Cromwell at once charged vehemently upon the Royalists, and his steady horsemen pressing in after him, with sword and pistol, soon defeated the enemy, and pursued them vigorously. The Royalist reserve, under General Cavendish, charged the Lincolners and routed them, when Cromwell, whose quick decision grasped everything, turned with the three troops, in reserve under Whalley, and fell upon the rear of Cavendish's horsemen, and drove them off the field with the loss of their leader, who was slain in the *mêlée*.[3]

Marston Moor, 2nd July, 1644, was another celebrated action, and its result was decided by the cavalry. The King's army was commanded by Prince Rupert and the Marquis of Newcastle. The Parliamentary army was led by the Earl of Manchester and Cromwell, and faced the east, while their opponents faced the west. The battle opened by an attack of the left wing of Manchester's army, the cavalry, under Cromwell, charging the cavalry of the Royalist right, under Prince Rupert. A desperate fight ensued between

[1] Clarendon's History, vol. ii. part i. p. 25. [2] Nolan, 20. [3] Ibid.

these two celebrated generals, and the fate of it was decided by Cromwell's precaution of always holding a reserve in hand. This fresh body suddenly falling upon the Royalists, while engaged in a hand-to-hand struggle, turned the scale, and gave the victory in that part of the field entirely to the rebels, who forced the right wing of the King's troops back in rear of their left.

While this had been going on in one part of the field, the exact counterpart had taken place on the opposite wings of the contending armies. The Royalist left wing had been charged by the enemy, under Sir Thomas Fairfax, and were at first put into confusion.[1] Lucas, who commanded the Royal horse, soon restored order to his forces, and made a vigorous charge upon the Parliamentary cavalry of the right, defeated them, and routed also the infantry of that wing. The result was that the two armies swung round on the centre to such an extent, that in the evening they each occupied the ground held by the other at the commencement of the action.[2] A decisive charge of Cromwell's cavalry, which he had collected from the pursuit, at last decided the fate of the day, and gave to the rebels a most important victory.

Naseby, fought on the 14th June, 1645, was somewhat similar in its character to Marston Moor, but was still more like the battle of Nordlingen, which will be referred to subsequently. Again, Rupert on the right wing, by a charge of cavalry, defeated the Parliamentary left, and drove it off, pursuing with mad impetuosity to a great distance. Cromwell, at the same time, had charged the Royalist left, under Sir Marmaduke Langdale, and routed it. Unlike Rupert, however, his calm judgment never left him for an instant, even in the hot excitement of a cavalry charge. He soon rallied his men, re-formed them, and led them into action, where he at once fell upon the flank and rear of the exposed infantry of the King's left wing, then engaged in a desperate struggle with the rebel foot. Rupert, in wild pursuit, his horsemen blown and scattered, did not return till the day was lost, and with it the King's crown. The difference in the conduct of the two cavalry officers conveys a great lesson as to the duties of a commander of horse, and is another proof of the necessity of combining caution with energy and impetuosity. Cromwell was as impetuous as the fiery Rupert, but his impetuosity was always directed with judgment, and while no one could surpass him in the tremendous vehemence with which he forced his way into the hostile ranks, neither could anyone surpass him in quick decision, and in the cool

[1] Nolan, 22. [2] Hume, v. 276.

deliberation with which he could check himself while in full career, and, if necessary, assume a defensive policy.

It is said that a few of the officers who served in the Civil War in England had served in Germany, and had charged under the great Gustavus and the gallant Pappenheim on many a hard-fought field. If so, the experience and the accounts of that war must have had their influence upon the hard-riding English country gentlemen and yeomen who formed the horsemen of the time, and whose native vigour would make them apt imitators of any system of warfare that required daring, energy, and downright hard blows.

Before leaving the English cavalry of this period, mention should be made of the Marquis of Montrose, who, in the campaigns in Scotland, gave proof of military capacity of the highest type, and who adopted a system of mingling infantry with the cavalry, not in masses, but in small parties, composed of Highlanders, a hardy race of mountaineers, who, swift of foot as the deer, kept up with the horsemen, and with broadsword and shield fought at close quarters, and with wonderful bravery. The campaigns of Montrose in the Highlands of Scotland in 1645, for boldness and skill, will compare favourably with anything in history.

The next generation produced in Scotland Grahame of Claverhouse, better known as "Bonnie Dundee," who was a cavalry officer of the highest quality, his impetuosity being unsurpassed, his energy and determination unequalled; while his skill in tactical and strategical movements was evinced in the strongest manner. Without the opportunities of displaying his ability, that most great generals have had, we have still enough information left concerning him to show that, with the single exception of Cromwell, the British Islands never produced a better cavalry commander.

CHAPTER XIII.

RUSSIAN CAVALRY AT THIS EPOCH—COSSACKS.

ABOUT the end of the fifteenth century we begin to hear of the cavalry known as the Cossacks, and as we shall subsequently refer frequently to their operations, and have to relate the most important results produced by their exertions, it will be of interest to say a few words about their early history.

The Greek Emperor Constantine Porphyrogenetus makes mention in the ninth century of a country named *Cosaquie*, situated near the foot of the Caucasus. It is said there existed, before the invasion of the Mongols, a Tartar people called Cossacks, who lived on the banks of the Don and the Volga. In 1021 they submitted to the Grand Prince Mstislaff, who had them in his army in his war in 1023 against his brother Jaroslaf. During the Tartar yoke there were no Russian Cossacks, but after that yoke was thrown off numbers of Russians established themselves in the former habitations of the Cossacks, and adopting a similar habit of living, naturally received the same name.[1]

The historical Russian tablets of the twelfth century often mention the existence of a free military organisation in the country lying between the Black Sea and the Caspian. They were composed of emigrants of all nations, but especially of Russia, Poland, and the Caucasus. They seem to have lived by war and plunder. The Tartars called them by the word "Khasaks," meaning revolted or free. Afterwards these bands became more thoroughly organised, and being settled in some particular districts, received the names of the territories; for example, the Don Cossacks, the Oural Cossacks, the Zaporog Cossacks, Yalek Cossacks, &c.[2]

It is said there were Cossacks in the army of Genghis Khan, in the year 1224, under the command of a Voievode named Ploskina. This Cossack leader induced the Great

[1] Haxthausen, La Force Militaire de la Russie, p. 147. [2] Ivanhoff.

Prince Mstislaff Romanofvitch of Kief to come out of his fortress, guaranteeing his safety, and kissing the cross as an oath testifying his good faith. On getting the prince in his power he tortured and killed him. This incident proves the lawless and savage character of these troops at that time. These same bands served in the Byzantine army under the name of "Alani."[1]

The Cossacks are mentioned in the reign of Vassili Vassiliavitch, when the Moscow militia fought against the Tartar Sultan Mustapha in 1444.[2] We hear of them also in Poland in 1516, and before 1579 the Zaporog Cossacks had fought against the Turks, with the armies of the Emperor Rodolph II.

The Cossacks paid no taxes; they received some land in possession, in return for which they were obliged to serve in time of war, as also were the noblemen and the children of the Boyars.[3] They were allies, so to speak, of the king, but at the same time were under his protection. All the soldiers of a district composed a horse regiment, which was named either after the name of the town, or of its Voievode. They were divided into hundreds, fifties, and tens, under the command of "sotniks" and "ouradniks." They were armed in the same manner as the other Russian troops, that is to say, with sabres, lances and bows and arrows, and afterwards with pistols and carbines.[4] Each regiment had its standard (*chorigoy*), a drum, and musical instruments. The Don Cossacks were the most numerous, and they are said to have had artillery. They always obeyed the summons of the Czar, but no one ever appeared among them to demand taxes. In the reign of Alexæ Michælovitch, 1655, it was ordered that each man taken for the cavalry should appear on a good horse, with one carabine and two pistols. Although they were principally cavalry, there were also foot regiments of Cossacks.

These irregular horsemen were most valuable auxiliaries, and from this period they always formed a very important portion of the Russian army. They were most useful for outposts and the minor operations of war, and in the campaigns of Russia during the eighteenth and the beginning of the present century they exercised a most important influence.

[1] Zeddler, ii. 235. [2] Ibid. [3] Gondim Leffcovitch, 10. [4] Ibid. 28.

CHAPTER XIV.

FRENCH CAVALRY—CAMPAIGNS OF CONDÉ, TURENNE, AND LUXEMBOURG.

SECTION I.—ORGANISATION, ARMAMENT, AND EQUIPMENT OF CAVALRY UNDER LOUIS XIV.

AT this period the cavalry of all European nations, except that of the Turks, was composed either of cuirassiers or of horsemen, who, although equipped and uniformed in various ways, were yet in reality simply dragoons. After the time of Gustavus Adolphus the cavalry seemed gradually to have fallen back somewhat in their tactics and method of fighting, and for a long period the system of providing cavalry with firearms, and relying mainly upon them, again came into use.

Louis XIV. increased the number of his guards or household troops very materially, and spent enormous sums in uniforming and equipping them, so that they were probably the most magnificent and expensive body of soldiery at that period maintained in Europe.[1] A large portion of them consisted of cavalry, there being four companies of body-guards, one company of gendarmes, one of light horse, and two companies of *mousquetaires*.[2] The companies of body-guards consisted of 360 men each, with a captain, three lieutenants, three ensigns, twelve exempts, twelve brigadiers, twelve sub-brigadiers, and six standard-bearers. Each company was divided into six divisions, called brigades, commanded by the three lieutenants and the three ensigns, according to their seniority.[3]

They were armed when on active service with the sword, pistol, and a *mousqueton*, a species of short musket. They were accustomed to fight with the pistol and sword, the *mousqueton* being only used in guarding a defile, in pursuit of a routed enemy, or in any service of a similar nature.

[1] Daniel, ii. 81. [2] Ibid. 82. [3] Ibid. 83.

In 1676 Louis XIV. created a company of mounted grenadiers to form part of his guard. It was composed of 130 men, forming one squadron of three "*brigades*." It had three lieutenants, three sub-lieutenants, three *maréchaux des logis*, six sergeants, and six *appointez*."[1] They carried the sword, the fusil, and two pistols, and fought both on foot and on horseback, distinguishing themselves as cavalry at Leuze, and as infantry at Valenciennes, where they stormed by a *coup-de-main* a fortress of the strongest kind.

The company of gendarmes contained about 200 men, with two captains, three ensigns, and three *guidons*, besides a number of officers of lower rank. In 1657 their arms consisted of the sword, the pistol, and in time of war a portion of them were supplied with rifled carbines. The uniform was of scarlet, and without defensive armour.

The company of light horse of the guard consisted of 200 men, two lieutenants, four cornets, ten *maréchaux des logis*, besides the inferior officers. This company, like all the other light horse, had attached to them in time of war a body of fifty carabins, under the command of the officer of the company. They usually opened the action by firing upon the enemy. This practice was in use about the year 1620, when afterwards Louis XIV. organised these bodies of carabins into regiments of carabineers. They were no longer attached to the corps of *chevaux legers*, and the company, which had been under the command of the captain of the light horse of the guard, was formed into a company of *mousquetaires*.[2]

The *chevaux legers* were armed with swords or sabres, and pistols. Afterwards they were also supplied with twenty carbines, which were given to the twenty men who formed the rear. They were used only on rare occasions, before they came to close quarters. They were also clad in scarlet, without defensive armour.

Two companies of *mousquetaires* completed the cavalry of the guard; they consisted each of 250 men, with the usual supply of officers. They served both on foot and mounted, and were veritable dragoons. At Cassel, as the army was forming up for the battle, the Marshal d'Humières perceived behind some hedges three battalions of the enemy. He immediately ordered the *mousquetaires* to dismount and attack these battalions, which they did, seconded by an infantry regiment, and soon defeated the enemy and drove them off. They then remounted and formed up in the order of battle

[1] Daniel, ii. 128. [2] Ibid. 143, 144.

as cavalry. They were armed with muskets, swords, and pistols.[1]

Besides the household troops there were large bodies of heavy cavalry in the army, called gendarmerie, as well as carabineers, light cavalry, and dragoons.

The carabineers were first formed into a regiment in 1693 by Louis XIV. It consisted of one hundred companies of thirty men each, or 3,000 men and 411 officers. This corps was organised into twenty squadrons of five companies each.[2] They were armed with large swords and rifled carbines, and were supplied with bullets of two sizes, the larger to be driven in with a mallet to secure the adjustment of the ball to the grooves, and the smaller size to enable rapid loading of the piece in case of need. They were also supplied with pistols.

The dragoons, who fought both on foot and on horseback, were armed with long straight swords, and with muskets and bayonets, instead of the *mousqueton* or carabine. They also carried an axe, or entrenching tool, at the saddlebow. The regiments of the line were formed in five squadrons of 150 men each, and were ranged in three ranks. The squadrons were subdivided into three companies, so that the whole regiment contained about 750 men.[3] It was during this period, that is to say, about the latter half of the seventeenth century, that dragoons were used to the greatest extent; in fact, almost all the cavalry, as we have said, were virtually dragoons. They were often used on foot as infantry when no infantry were at hand for the purpose. In 1664, six days before the battle of St. Gothard, dragoons were used as infantry in a reconnaissance.[4]

On the accession of Louis XIV. to the throne he found only one regiment of dragoons in the French army. In 1659 he created a second; and it will give some idea of the system of cavalry tactics of the period when it is mentioned that in 1690 the total force of this kind in France had increased to forty-three regiments.[5] One reason for this increase is said to have been that it was found that in long wars the dragoons were the most suitable, as they had greater solidity than the other arms, and were better able to endure fatigue. Napoleon I. imitated the idea in Spain, and for the same reason.

Hussars were also introduced about 1691. They were expected to rely much upon the sabre. They used short stirrups, and manœuvred very loosely. The cuirassiers and light cavalry ranged as the others in three ranks, did not fire

[1] Daniel, ii. 152. [2] Ibid. 343. [3] Carrion Nisas, ii. 110.
[4] Duparcq, ii. 210. [5] Rocquancourt, i. 378.

as formerly by successive ranks, each retiring to load after having fired, for it seems, on the contrary, that all three ranks fired at once, and then generally charged sword in hand.[1]

The charge, however, was not very vigorous, for they usually moved at the trot. They sometimes advanced at a slow pace, pistol in hand, and then after firing at close range, took to the sword when the *mêlée* commenced.[2] The cavalry service had somewhat fallen back. They did not press on with even the vigour of the horsemen who were led by Gustavus Adolphus, Cromwell, and Pappenheim, while the charge at speed with hand-to-hand weapons, which had been the custom of the cavalry of Hannibal, was yet to be revived.

The cavalry formed in three ranks, generally at twelve paces behind each other, although under Turenne the distance was only six paces. Turenne was not at all in favour of the use of firearms by cavalry, and at the battle of Zintzheim he ordered them to use the sword alone. The French horsemen were not very well drilled, were unable to manœuvre at the gallop, and their charges were very irregular, but when well led they were capable of performing good service, as was proved by the battles of Rocroy, Dunes, and Leuze.

The cavalry were formed up for action on the wings, the infantry being in the centre. Turenne, according to M. de Quinci, often intermingled the cavalry squadrons with the infantry battalions, and Montecuculi, on the same authority, is said to have used the same formation in his orders of battle, with the object of enabling the different arms mutually to support each other.

De Quinci also says that it was the universal custom in Europe to place the infantry in the centre and the cavalry upon the wings.

Although the cavalry had once again fallen back upon fire-arms as their principal weapon, and although in most European countries the horsemen were almost all dragoons, still the example of Gustavus was too recent not to have had an effect for a time upon cavalry tactics. It only required a bold commander of horse to appear upon the scene, and at once his presence was felt, and the cavalry exercised an important influence upon the result of battles. This was clearly shown in the Civil War in England, when Cromwell's "Ironsides" met the dashing cavaliers of the gallant Prince Rupert. At the same time that the English horsemen under their able leaders were exercising a most decisive influence

[1] Duparcq, ii. 211. [2] Ibid.

upon the actions taking place in that war, another brilliant cavalry commander made his *début* in France, and won a victory by the impetuous use of his horsemen that would compare favourably with the celebrated battles of Alexander the Great.

The Great Condé was a born soldier, and in his first battle at Rocroy, when a lad of only twenty-one years of age, he gave evidence of the greatest military genius. His impetuosity and boiling courage particularly qualified him to command a cavalry force, and it was by the wonderfully skilful as well as energetic use of his horsemen, that the field of Rocroy was gained, and his reputation as a general established for ever by one spring morning's work.

The Spanish army, under Don Francisco de Melo, had invaded France in May, 1643, and was besieging Rocroy. Their army consisted of 26,000 picked soldiers, the infantry being considered then the bravest and steadiest in all Europe, while De Melo was an old and experienced general of high reputation. Condé, then known as the Duke d'Enghien, had in his army only 14,000 infantry and 7,000 horse.[1]

Between the two armies, when Condé took the command, lay a very broken and marshy country, full of defiles and woods, and very defensible, so that the Spaniards might have disputed the advance of the French with every prospect of success. This they failed to do, and Condé sent on Gassion with a body of cavalry to throw supplies into Rocroy, and to reconnoitre the enemy.[2] This he did successfully, and Condé was enabled to get through the broken district and form up his troops for action close to the town. His army was ranged in two lines, the infantry in the centre, the cavalry upon the wings, with a reserve in rear, composed of some companies of gendarmes and light horse. Platoons of fifty musketeers were placed in the intervals of the squadrons.

The Spaniards were drawn up in a similar order, but De Melo had placed 1,000 musketeers in a little wood in advance of his left, to charge the French as they advanced their right wing. Condé took command of his right, Gassion being under him. The Maréchal de l'Hôpital commanded the left, while De Melo himself was opposed to the Maréchal and the Duke of Albuquerque commanded the Spanish left in front of Condé.

The attack was commenced by the young French prince, who at once fell upon the 1,000 musketeers in the copse, and cut them to pieces.[3] He then turned to the left and fell upon Albuquerque, while he sent Gassion at the same time to turn

[1] Rocquancourt, i. 440. [2] Ibid. 441. [3] Life of Condé, 19.

his flank. This charge was crowned with complete success. In a few minutes the whole Spanish cavalry of their left were dispersed and flying. Detaching Gassion with a small force to pursue the fugitives and prevent them rallying, Condé turned to the left with his horsemen, and struck the exposed flank of the German, Walloon, and Italian infantry, who were upon that wing of the Spanish army.[1] Fortune smiled upon the young general, and wherever he appeared success followed him. In a very short time the whole Spanish left wing was utterly broken and routed.

While victory was with Condé in his part of the battle, with the Maréchal de l'Hôpital everything had gone wrong. News was brought to Condé that De Melo, with the choicest Spanish troops of the right wing, had repulsed the French left with such vigour that all had gone down before them, that De l'Hôpital had been driven back, his cannon taken, his infantry cut to pieces, and the fugitives thrown into confusion upon the reserves.

When these disastrous tidings reached Condé, he was in rear of the Spanish right, pursuing the fugitives he had beaten. His extraordinary genius, his quick *coup d'œil* enabled him to form his decision with lightning rapidity. Rallying at once the cavalry of the wing he commanded, he thundered along the whole rear of the Spanish army, and fell furiously upon the rear of De Melo's cavalry, who were pursuing the fugitives of De l'Hôpital's command. In an instant the fortune of the day changed. Everything went down before his impetuous onslaught; the once victorious Spanish division was speedily conquered, the cannon recaptured, the prisoners released, and the defeated enemy scattered and sent flying in every direction.

The Spanish infantry of the centre, however, still stood firm. This old and renowned force, which for a hundred years and more had been deemed almost invincible, was commanded by the gallant Count of Fuentes, and by its steadiness and extraordinary courage was still nearly securing the victory. Three times did the French cavalry under their brilliant leader charge vehemently upon their serried ranks, but in vain. The Spaniards had formed in hollow squares with their artillery in the centre. With the coolness of a parade movement they poured in a tremendous fire of musketry, and when the French horsemen had arrived within fifty yards they opened spaces through which the cannon vomited forth a storm of missiles that carried terrible destruction among the advancing cavalry. Three times in

[1] Rocquancourt, i. 441.

this way the troops of Condé were driven back as waves from a rock. Then he ordered the whole of his reserve to advance, and the Spaniards, hemmed in on all sides, asked for quarter. Condé advanced to grant it, when the enemy, misunderstanding his movement, and thinking he was about to charge, fired a heavy volley, which so exasperated the French, who attributed it to treachery, that they fell upon them and massacred almost the whole force.[1] A reinforcement of Spaniards, under General Beck, which was coming up, meeting the fugitives, fell back on the approach of Gassion, whom Condé had detached to check their advance, so that the victory was of the most decisive character, and may be attributed almost entirely to the cavalry.

This action is remarkable as showing the extraordinary effect that the presence of one man of genius can have upon the results of a cavalry action. Wherever a great cavalry officer has appeared his influence has almost invariably affected materially not only the tactics of the service, but the issue of the war.

This action revived the credit of the cavalry service, and for a short time checked the growing reputation of the infantry. It did not add anything to the military art, for the conduct of Condé was much like that of Alexander at Arbela.

Two years after this, on the 4th August, 1645, an action took place at Nordlingen between the French and Bavarians, in which the cavalry also performed an important part. The Bavarian army took up a strong position, with each wing resting upon a hill, the centre being covered by the village of Allerheim, which lay about three hundred yards in front of their line, and which, being entrenched and loopholed, made a strong position. General Merci himself commanded the centre of the Bavarians, General Gleen the right wing, and the famous cavalry officer Jean de Wert the left wing.

The Marshal de Grammont commanded the French right wing, Turenne the left, and the Count de Marsin the centre, Condé being in supreme command. An attack was made by the French upon the village of Allerheim, which was unsuccessful, but General Merci was slain in repelling it. At the same time Jean de Wert had attacked the French right with such vigour that he defeated it. The Marshal de Grammont, who received the attack at the halt, and with a fire of carbines or musketry, was at once overthrown and taken prisoner. The second line suffered the same fate, and Jean de Wert, following the fugitives, allowed his men to

[1] Life of Condé, 20, 21.

get out of hand and scattered pillaging the camp, instead of using them to fall upon the exposed flank of the French line. In the meantime, Turenne, after a most obstinate struggle, had succeeded in defeating the Bavarian right, and, falling upon their flank, had driven them back and enclosed them in the village of Allerheim, where great numbers surrendered.

Jean de Wert, with his victorious wing, at last returned, but too late; and then, instead of moving across to the rear of Turenne, he first went back to his original position, losing by that more time, so that all he could do was to cover the retreat and lead the broken remnants of the army from the field.[1] This battle is instructive to the cavalry officer as another illustration of the importance of keeping victorious horsemen well in hand.

The battle of Dunes, fought on the 14th June, 1658, to cover the siege of Dunkirk, was a remarkable action, showing a great advance in the military art. The skill displayed by Turenne was very striking, and the influence of his reflection and talent in availing himself of every point that could ensure success was beyond anything that had been done up to his time. At high tide he availed himself of the fire of an auxiliary English fleet which lay off the coast, while, when the tide ebbed, he used the beach to enable him to effect a turning movement around the enemy's flank. Everything appears to have been considered and arranged to the greatest advantage.

The Spanish army consisted of 6,000 infantry and 8,000 cavalry. Don John commanded the right, which rested on the sea. The Great Condé commanded the left. The French army had 6,000 horse and 9,000 infantry, and was ranged upon two lines, with a reserve. The Marquis de Créqui commanded the right, Castlenau the left, and the Marquis of Gadagne and De Bellefond the centre. When the battle was fairly joined, the tide had gone out, and the Marquis of Castlenau, with the cavalry on the French left, was able to march along the strand and pass the right flank of the Spanish line. When wheeling against them he penetrated between the two lines of the hostile army, and spread confusion in all that part of the field. Condé, however, on the other wing, had fought with his usual bravery, and leading a charge of cavalry against the troops of the Marquis de Créqui, defeated him, and would have succeeded in throwing relief into Dunkirk but for the arrival of Marshal Turenne with some cavalry of the right wing, which he led at the charge to Créqui's assistance. After a desperate struggle, in

[1] Ramsay's Histoire de Turenne, i. 132, 133, 134; also Turenne's Memoirs.

which Condé's horse was shot under him and he himself almost taken prisoner, the victory was won by Turenne and the whole Spanish army driven in rout from the field.

This battle is mainly interesting from the fact of the cavalry using the strand on the fall of the tide to effect a turning movement upon the Spanish right, a stratagem that Don John had evidently neither anticipated nor guarded against. This is a very striking instance of a plan of battle being arranged to suit the peculiarities of the field of action.

At the battle of Zintzheim, on 16th June, 1674, the dragoons of the French army, having arrived in front of the enemy's position before the remainder of his troops had come up, Turenne at once employed them to open the action by an attack upon the town of Zintzheim,[1] which formed the support of the right of the Duke of Lorraine's army, and covered the passage of the river Elsatz, which lay between the two armies.[2]

The dragoons, under the command of the Chevalier d'Hocquincourt, dismounted, and forming up as infantry, made a vigorous attack, through the gardens, vineyards, and broken ground, which was promptly supported by the infantry. They soon drove the enemy into the town itself, and pressing on through the water of the moat, and forcing open a gate in the wall, thus effected an entrance, captured 400 of the garrison, and slew or dispersed the remainder.

The cavalry and the rest of Turenne's army, crossing the stream, moved on to attack the enemy's main line of battle, which was drawn up on a high ground, bordered on one flank by vineyards and hills, and on the other by a long hedge. The summit of the hill was somewhat open, and fit for cavalry operations, and the Imperial army, composed mainly of cavalry, was drawn up across it. Turenne at once, contrary to the usages of the time, adapted his formation for battle to the peculiarities of the ground, and placed his cavalry in the centre, and his infantry upon the wings. This was done to enable the infantry to advance through the vineyards on his right, and along the hedge on his left, and as he was superior in that arm, he pressed them on, continually outflanking and turning the line of his opponents, and so supporting the steady advance of his horsemen, who after desperate fighting were gradually able, with the assistance of their infantry, to press back the hostile cavalry, and obtain room to deploy their lines upon the summit and bring all their force into action.

This battle was a remarkable instance of the adaptation of

[1] Ramsay's Turenne, i. 503. [2] Buisson, Vie de Turenne, 432, 433.

the formation for battle to the character of the field of action. The ground being suitable to the operations of infantry on the flanks, the combat was carried on on the principle of the double oblique, the two wings continually being pressed forward, and so compelling the retreat of the centre. From this time the peculiarities of the battle-field are seen to exercise a certain influence upon the formation of troops for action.

Luxembourg followed closely in the steps of Turenne, and knew well how to accommodate the disposition of his troops to the nature of the ground.[1] He understood fully the principle and the advantages of the oblique order. The battle of Fleurus, fought on the 1st July, 1690, is a very good illustration of that kind of formation for battle. The centre and left wing of his army were drawn up as if to attack the position of the Prince of Waldeck in front, while the right wing made a turning movement, and fell upon the left flank of the enemy's line. The cavalry of the left of Luxembourg's army was deployed on each side of the village of Fleurus in the fields, while the infantry were strongly posted in the place itself. The turning movement was successful, and decided the fate of the battle, which would otherwise have been doubtful, for the French cavalry on the left were at first defeated, and thrown back in confusion, as well as the infantry supporting them.

The combat of Leuze, in 1691, is another illustration of the ability of Marshal Luxembourg, and is of interest as a most skilful employment of cavalry. Luxembourg knew that the Prince of Orange was about falling back across the river which lay in his rear, and he suspected that the Prince, relying on the great distance there was between the two armies, would leave a rear-guard of cavalry to cover the retreat, without attaching infantry to support them.[2] When he knew the movement was commencing, Luxembourg, with a good force of cavalry, made a rapid night march, and early in the morning came upon the cavalry rear-guard of Orange's army, which was just about crossing the bridges. He came upon them so suddenly that they were not formed in line of battle, and had no time to prepare to receive the attack. They were at once thrown into confusion, and very severely handled. In this action Luxembourg, with twenty-eight squadrons, almost all composed of the guards of the King of France, defeated the seventy-five squadrons of the allied troops and captured forty standards. The fame of the victory resounded throughout Europe, and was considered

[1] Grahame, 146. [2] Feuquière, in Liskenne, iv. 648, 649.

worthy of being commemorated by a special medal, which Louis XIV. caused to be struck for the purpose.[1]

The cavalry did good service at Neerwinden in 1693, where Marshal Luxembourg defeated the Prince of Orange. The attacks made by the French along the front of the enemy's position had failed three times, when on the fourth attempt the cavalry charged through or over the field entrenchments, and taking Neerwinden in reverse, so assisted the infantry as to decide the fate of the day. It is strange that upon this very same ground, a few years later, the famous Duke of Marlborough carried the lines of the Mehaigne by his cavalry, who, filling the ditch with their trusses of hay, rode across the entrenchments and carried the position by a *coup de main*.

[1] D'Aldeguier, 53.

CHAPTER XV.

MONTECUCULI.—THE GERMAN CAVALRY.—THE BATTLE OF ST. GOTHARD, 1664.

IN the latter half of the seventeenth century, the most prominent general of the German service was Montecuculi, the great opponent of Turenne, and one of the ablest soldiers of the age. His memoirs on the Art of War, on the military system of the Turks, and his account of the campaign of 1664, are most important contributions to military literature, and contain evidence of very marked ability on his part.

From the pages of these memoirs we obtain much valuable information in reference to the cavalry service in Germany, and the wars in which Montecuculi was engaged. The infantry were composed of pikemen and musketeers;[1] the pikemen being employed to defend the force from the charge of cavalry. The cavalry were organised in squadrons of 150 strong, or three ranks of fifty men each.[2] Sometimes where heavy masses were required, two squadrons were united. The distance from one squadron to another was usually eighteen paces, and Montecuculi approved of placing in these intervals small pelotons of musketeers, eight in front by five in depth.[3] He fully appreciated the value of reserves, and advocated drawing up the army for action in two lines, the cavalry in each line having cavalry reserves in rear, so that according to his ideas the horsemen were to be drawn up in four lines, one behind the other. The dragoons he placed on the wings.

The cavalry he divided into cuirassiers and light cavalry. The cuirassiers he armed with casques, breast and back plates, and gauntlets of iron reaching to the elbow. The offensive weapons were the long sword, pistols, and some *mousquetons*. The force was required to be firm, steady, and solid. The light cavalry were employed for escorting convoys, for recon-

[1] Montecuculi, 27. [2] Ibid. 33. Ibid. 37.

noitring, for foraging, &c., and were armed with sword and carbine, and were maintained in but small numbers.

Montecuculi has been often quoted as a great authority in favour of the lance as a cavalry weapon. He says that of all arms which are used on horseback, the lance is the best, but it is necessary that it shall be well supported, that the lancers must be vigorous, armed from head to foot, have first-class horses, and a level, firm, and unobstructed ground, upon which to operate. If all these points are secured, and a body of cuirassiers are at hand to follow up any success, he thinks great results might be attained. But, if the lance is not thus aided, if the man, the horse, the ground, are not exactly suitable, if there are no cuirassiers at hand to follow up the attack, Montecuculi says the lance is useless.[1] So that, after all, his opinion in favour of that arm is not so decided as it might be.

Montecuculi understood the use of dragoons thoroughly; he says, "Dragoons are still infantry to whom horses have been given to enable them to move more rapidly."[2] The infantry he looked upon as the principal force and the main portion of an army, but he still considered that the heavy cavalry should be equal to one half of the infantry, and the light cavalry only one quarter of the heavy.

With all Montecuculi's great genius for war, he was not a cavalry officer; and his cautious calculating method of gaining campaigns, by careful manœuvring and marches, was not the style of warfare to bring prominently forward the cavalry service. The cavalry during his time was not distinguished by any important exploits; the heavy armour and torpidity of action which had crept into it made it far less efficient than in the preceding generation, when such impetuous spirits as Pappenheim, Piccolomini, and Tersky, imparted life and vigour to the movements of their followers.

Montecuculi won a great victory over the Turks at St. Gothard in Hungary, on the 1st August, 1664. The Turks had a very large force of horsemen, which he was fortunately able to prevent crossing the river to attack him, so that about 30,000 Turkish cavalry were unable to take a very active part in the battle.[3] Montecuculi's dispositions were evidently made to resist superior bodies of light cavalry. His infantry were ranged in six ranks, the two front ranks musketeers, the four rear ranks being pikemen.[4] Between the squadrons of cavalry he placed small parties of musketeers of twenty-four or thirty each, who, in case of being obliged to give way, were ordered to join the nearest infantry battalion. The musketeers

[1] Montecuculi, 225, 226. [2] Ibid. 228. [3] Ibid. 457. [4] Ibid. 442.

were to fire by alternate ranks, so that a portion should be always loaded.

The heavy cavalry, strange to say, and it speaks volumes for the reputation of the Turkish light horse, were ordered not to leave the infantry to pursue the enemy. The whole army was directed to advance in case of success *en masse* slowly. The light cavalry alone were allowed to pursue the fugitives. These orders for action show clearly the heavy defensive style of tactics that Montecuculi had laid down for his cuirassiers. This system was probably required against the Turkish light horsemen, who in the *mêlée* were more than a match for the unwieldy Western cuirassiers. The only hope of success for the Turks was in wearying the heavy cavalry in pursuits and manœuvres, and in tempting them to break their solid masses, against which, when firmly held together, they could not oppose any effective resistance.

CHAPTER XVI.

EARLY PART OF EIGHTEENTH CENTURY.—CAMPAIGNS OF MARLBOROUGH AND PRINCE EUGENE.

THE Duke of Marlborough and his friend and ally Prince Eugene of Savoy were two of the most celebrated generals in the history of war, and both made a very effective use of their cavalry in action. The most important and decisive battle of the time was won by their combined efforts at Hochstadt, or Blenheim, on the 13th of August, 1704.

This battle was decided almost altogether by the judicious use of the cavalry of the allied army, which was very numerous, and of a very fair quality. It is computed that in Marlborough and Eugene's combined army there were 32,000 infantry, and about 20,000 cavalry; while in the French army there were 82 battalions, and 152 squadrons, making in all 56,000 troops. Marshal Tallard, who commanded the French forces, drew up his army in a strong position behind the river Nebel, while his right was posted in the village of Blenheim, and so rested on the river Danube. His centre lay on sloping ground, and was composed almost altogether of his cavalry, which to the number of about fifty squadrons held the line from Blenheim to Oberglaugh. The cavalry of the Elector's army, being placed on the right, brought nearly all of that force together in the centre. The infantry were placed in great force in the village of Blenheim, which Tallard evidently considered the key of the position. The army was drawn up in two lines; but in the centre of the second line of the cavalry were placed three brigades of infantry.

Marlborough, on coming up to attack, saw the defects of Tallard's dispositions. He at once perceived that the long lines of cavalry in the centre, defending a position behind a stream, made a weak point, where a vigorous attack of his superior cavalry would break the hostile line, separate the wings from each other, and enable him to coop up the troops

in Blenheim, and strike the whole left wing of the Elector's army in flank, and drive it from the field.

Marlborough at once made his arrangements for forcing the passage of the Nebel, and formed his army in four lines, the first of infantry, the second and third of cavalry, and the fourth of infantry in reserve. This was a formation admirably adapted to the nature of the ground, and the position of the enemy. The first line of infantry was to secure the passage of the stream and the erection of bridges, and to cover the crossing of the cavalry, while the fourth line of infantry remained on the bank to form a reserve in support of the manœuvre. The pontoons were immediately brought up, five bridges constructed, and the stone one repaired. To confirm Tallard in the idea that Blenheim was the important point, Marlborough directed a powerful attack against that place which was vigorously but unsuccessfully maintained for some time, while his dispositions in the centre were being completed. The infantry of this attacking column was charged in flank by three squadrons of French gendarmes. Lord Coutts sent for a re-inforcement of cavalry; five squadrons soon arrived and were at once attacked by an equal number of French gendarmes who saluted them with a fire of *mousquetons*, or carbines. The allied horse charged at once sword in hand, and drove them back through the intervals of the infantry, when, being galled by musketry, in front and flank, they were obliged to fall back. On the right of the allied army, Prince Eugene on coming into action had been opposed with determined bravery by the Elector of Bavaria and his army. The struggle lasted for some hours with varying success, during all which time Marlborough was endeavouring, in the centre, to get the large masses of his cavalry across the fords and marshy valley of the Nebel, and to effect a secure lodgment on the opposite bank. This was only effected after hard fighting, in which at one time Marlborough's cavalry were driven back to the rivulet, and obliged to rally under the protection of their infantry. The second line of cavalry, then advancing, again pressed back the French squadrons, but, being galled by a fire of musketry and artillery from Blenheim, the advance was checked.

At five o'clock, Marlborough had at last succeeded in completing his arrangements for his grand attack upon the centre of the enemy's position. During the preliminary struggles, while Marlborough was trying to advance, Tallard had interlaced the cavalry with the nine battalions of infantry that had been in the second line. To counteract this three battalions of Hanoverian

infantry were placed in a similar manner at the corresponding point of the allied position, and supported by some pieces of artillery. Amidst a tremendous fire of musketry and cannon, Marlborough's cavalry, with the three battalions, moved slowly up the ascent against over 10,000 French horsemen, who waited to receive them. So hot was the fire that, when the assailants drew near, their advance was checked, and they fell back about sixty paces. The fire of artillery was vigorously maintained for a short period. Soon the French musketry volleys became less sustained, and their infantry began to shrink from the tempest of balls which inflicted deadly losses in their ranks.

After a slight pause, Marlborough made another advance, and the French horsemen gave way. The nine infantry battalions were cut to pieces or captured. Tallard, rallying his defeated cavalry, formed a second line at some distance to the rear, and made another effort to retrieve the day, but in vain. Marlborough saw the decisive moment had arrived, and ordering the trumpets to sound the charge, he led his cavalry forward with tremendous force. The French horsemen, discouraged with the result of the previous combat, and dismayed by the imposing effect of the advancing rush of the charging squadrons, fired a scattered volley from their carbines at a distance, and immediately wheeled about and fled. The victory was won, the allied cavalry virtually inundated the whole plain in the centre of Tallard's position, swept around Blenheim, and cooped up in it the bulk of the French infantry which surrendered at discretion, then rolled up the *débris* of the right of Tallard's cavalry in the village of Sonderheim, captured the Marshal himself, his staff, and a large force of his horsemen, and attacking the exposed flank of the Elector's army, precipitated their retreat, and completed a most decisive victory.[1]

Although the successes gained by the cavalry in this action were so great, although the part played by it was so decisive and so important, yet the whole particulars prove that the service was not properly understood, and that it was only because the system was equally faulty on both sides that Marlborough's successes were so great. We still see in this action the pernicious habit of mingling infantry with the horsemen, even in a general attack, and we see the cavalry still using firearms to a great extent. Marlborough's first charge (so-called) must have been delivered at a very slow pace, for the infantry and artillery evidently kept up with the cavalry. Tallard's system of tactics was equally bad, for he

[1] Coxe's Life of Marlborough.

evidently expected to defend a position in an open plain with cavalry at the halt. Who can doubt for one instant that, if Tallard had ordered a charge at full speed, sword in hand, upon the English cavalry at the critical moment when they recoiled the sixty paces, he would not have swept the whole force back in confusion upon the fords and marshes of the Nebel in their rear?

Marlborough was equally faulty in not relying more upon speed. He appreciated the effect of the weight in massing such large bodies of horse, but he left out an important item when he neglected the speed. Again, the moral effect in war is the most powerful element in attaining success, and the imposing effect of a bold advance at full speed would have had quite as serious an influence upon the motionless lines of horsemen as all the bullets that could be sent about their ears.

We see in this battle the idea of using cavalry in heavy masses, of pouring them, so to speak, over a whole section of a field of battle, in order to produce important results by the sweep of enormous lines of charging horsemen. The battles of Marlborough laid the foundation of the system of Frederick the Great, who, of all generals of modern times, most clearly appreciated the effect of the shock of a whole wing of cavalry at full gallop in close order and with a regular alignment. Frederick simply added the speed to Marlborough's system.[1]

The battle of Ramilies, fought on the 23rd May, 1706, was very similar to Blenheim in its main features, but the number of cavalry engaged on both sides was much greater. The allied forces consisted of 35,000 infantry and 29,000 cavalry, to which the French opposed 40,000 infantry and 35,000 cavalry. Marshal Villeroy, who commanded the French army, had imitated somewhat Marshal Tallard's dispositions at Hochstadt, his right wing resting on the Mehaigne in the village of Tavieres, and the cavalry being ranged along the plain between that point and Ramilies. After a feigned attack on Villeroy's right, Marlborough made his real attack against the enemy's lines of cavalry, and his own horsemen being drawn up in three lines gave him the advantage of having fresh reserves to bring into action. A body of fourteen squadrons of dismounted dragoons, together with two infantry battalions which Villeroy had sent to reinforce his position at Tavieres, were intercepted by a charge of some cavalry from the allied third line, and either cut to pieces or driven into the river. The main body of cavalry then charged, as

[1] Grahame, 170.

was done at Hochstadt, and drove the French back upon their second line, which at once in turn attacked the victorious allied horse, and drove them back in confusion upon their supports.

At this critical moment, Marlborough came up with seventeen squadrons from the right, and the squadrons which had attacked and defeated the dismounted dragoons, coming up on the other flank at the moment, restored the battle, checked the advance of the French horsemen, and enabled the allied lines to regain their order.

Marlborough, seeing that the decisive struggle was taking place among the cavalry, had ordered up from his right every available horseman. Twenty fresh squadrons arrived at full speed, and formed a fourth line in rear of the right flank. This turned the scale, and the French right wing was swept back upon their centre—their whole position pierced, and their line outflanked and enfiladed. A vigorous attack in every part of the field completed the victory, and the French retreated in hurried rout, with the loss of many prisoners.

In this battle we see the more decided use of reserves, and the important effect produced by them in cavalry actions.

At Malplaquet, on the 11th of September, 1708, Marlborough again employed his cavalry to break the enemy's line of battle, and here again the attack was made in the centre. This charge of cavalry is the more remarkable, as it was made against a strong line of entrenchments which the the French had thrown up to defend their position. Marlborough's cavalry, under the Prince d'Auvergne, penetrated through some gaps between the redans, and deploying, were enabled to drive back the defenders. Being quickly and bravely supported by a large force of infantry, the lines were held by the English, although the reserves of the French cavalry had checked and repulsed the allied horsemen.

About this period the practice of strengthening lines of battle with field entrenchments was coming very much into use, and for a time war was conducted very much upon the principle of taking up strong positions, and defending or attacking them, or manœuvring to enforce the evacuation of them. Marlborough on many occasions used his cavalry very skilfully in forcing lines of entrenchment of this kind. A celebrated instance occurred at the passage of the lines of the Mehaigne in 1705. These lines were very formidable, and had occupied three years in their construction. They extended from Namur on the Meuse to Antwerp. The

strongest position on the whole line was that between Leuwe and Helisheim, where the steep and slippery banks of the little Gheet, formed a ditch in front of the entrenchment, which consisted of a series of redans connected with a curtain. Marlborough decided to attack at that point, as being likely to be less carefully guarded than the more exposed portions.

On the 17th July, Marlborough made a feigned attack on the other extremity of the lines, near Namur, and made a general movement of his whole force to the left, as if to support it. This deceived Villeroy, who moved the great bulk of his forces to the right, leaving the lines near Leuwe but thinly guarded. Then ordering all his cavalry to provide themselves with trusses of hay instead of fascines, which would have given an intimation of the projected attack, Marlborough moved rapidly during the night with a large force of cavalry and twenty battalions of infantry, and the cavalry fording the Gheet, and filling the ditch of the entrenchments with their trusses of hay, soon effected a passage, and charging the French who were coming up to attack them, gave time for sufficient troops to arrive and cross the entrenchments, so that a secure lodgment was effected, and the whole French army obliged precipitately to retreat.[1]

In the passage of the lines of Bouchain in 1711, the cavalry also performed most valuable services, and covered the crossing of the main body and its formation in line of battle.

The battle of Almanza, fought in Spain in 1707, was a most hard-fought and decisive battle. The English infantry fought most gallantly, and broke the French centre; but the Duke of Berwick, who commanded the French, had a much superior force of cavalry, with which he defeated the wings of the allied army, and then pursuing with his horsemen thirteen battalions of the English infantry that had cut their way through to a wood, succeeded in compelling them to surrender. The allied troops in this action were badly formed up, the different arms being all mingled together. The victory to the French was most decisive, and virtually ended the war in Spain.

[1] Coxe's Life of Marlborough.

CHAPTER XVII.

CHARLES XII. AND HIS CAVALRY.—BATTLE OF PULTOWA.

CHARLES XII. of Sweden was a man of such extraordinary vigour, and of such supernatural energy, that it was impossible for him to have engaged in war without serving to a great extent in the cavalry force, and without his iron will and fiery impetuosity affecting very materially the tactics and employment of that portion of his armies in the field.

He unfortunately did not possess that caution which is so important a requisite in a commander. Had his judgment been good, and his measures directed with greater wisdom, he would have been the ablest soldier of modern times.

He paid the closest attention to his cavalry, used it most skilfully in action, and in fact paved the way for the improvements made by Frederick the Great, and set the example to General Seidlitz, who, judiciously developing the idea, rendered the cavalry of the celebrated Prussian monarch as fine a force of horsemen as ever existed.

Charles XII.'s energetic temperament led him to delight in hand-to-hand combats at full speed. His wild energy could not brook the tame and sluggish advance, and the slow and methodical firing of pistols and carbines at a distance. He liked better the charge with the bayonet for the infantry, and sword in hand for the cavalry. He absolutely prohibited defensive armour of any kind among his horsemen, in order to increase to the utmost their capacity for speed and endurance. The use of firearms among them was positively forbidden, and the employment of hand-to-hand weapons alone permitted.

This system of cavalry tactics was the natural outcome of his daring and chivalrous spirit. He led his horsemen sword in hand against infantry, cavalry, or entrenchments, over any kind of country. No difficulties daunted him, for he forced his way through all opposition.[1]

[1] Nolan, 18.

In the pursuit of a routed foe, his restless vigour was specially manifested. He followed the retreating Saxons, under Marshal Schulenberg, for nine consecutive days without unsaddling, and on overtaking them at Sanitz, near Punitz, he charged boldly with two regiments of cavalry only, against 10,000 of them, rode over the infantry who threw themselves down to evade their impetuous onset, drove the Saxon cavalry from the field, and then returned to attack the infantry and guns, who only escaped him by night coming on, under cover of which they crossed the frontier. Charles in this action captured all the cannon. The fighting was altogether with the sword, which was a long straight weapon, and used principally for thrusting.[1]

The cavalry, under Charles XII., were taught to manœuvre with a rapidity that up to his time had been unknown. It is said that in 1707 he rode two horses to death, at the review of a regiment,[2] proof conclusive that he at least moved about with a celerity that must have had a great influence upon the movements of his horsemen.

The battle of Pultowa in 1709, fought between Peter the Great of Russia and Charles XII., resulted in a most decisive victory for the Russians, and virtually ended the military career of the King of Sweden.

The measures taken by the Czar were very ably conceived and skilfully executed. He felt it important to have his position strengthened by entrenchments, but seeing that a continuous line of works confined an army to a defensive system of tactics and prevented a rapid change to an offensive policy, he covered the front of his position by a line of seven detached redoubts, separated by great intervals, and containing two battalions each. By this means his infantry and cavalry could readily advance between the redoubts, and attack or pursue the enemy if they were repulsed.

Charles XII., although badly wounded and obliged to be carried in a litter, made the attack on the morning of the 27th June just before daylight, with a large body of cavalry supported by infantry. The Russians resisted bravely, and the Swedes were only able to capture two redoubts which were not finished. Six battalions of the Swedish infantry and ten squadrons of cavalry of their right wing were repulsed, cut off from the remainder of their army, and obliged to retreat to the shelter of a wood.[3]

The struggle between the cavalry swayed backwards and forwards with varying success, the Swedes being well supported by their infantry, the Russian horse not being able to

[1] Nolan, 18. [2] Beamish, 42. [3] Journal de Pierre le Grand, ii. 12 to 25.

receive such prompt aid from their foot soldiers, who being in entrenchments could not move up so rapidly. Lieut.-General Baur was therefore ordered to fall back from the right side of the entrenchments to give the Russian infantry an opportunity to come into position. He was also ordered to fall back if attacked by infantry, but to stand firm against the cavalry. The result was that the Swedish cavalry were checked by the infantry and cannon of the Russian lines, and suffered such heavy losses as to be obliged to fall back out of range of the artillery. The Russians then under Prince Mentchikoff and Lieut.-General Renzel, with five regiments of cavalry and five battalions of infantry, moved upon the Swedish troops which which had been cut off and driven into the wood, and charged them, defeated them completely, and made the greater part prisoners.

The Emperor then arranged his army to renew the action. He moved a portion of his infantry forward on the flank of the line of entrenchments, so that if the Swedes attacked they would be met in front with determined resistance, while they would be at the same time attacked in flank by the wings which were advanced. Charles, aided by Field-Marshal Rheinfeld, formed his army for a final effort, the infantry being in the centre, the cavalry on the wings. Peter the Great adopted a similar formation, advancing all his line from the entrenchments, and moving six regiments of cavalry from the right wing to the left. Then at nine o'clock in the morning the action recommenced on the Russian left, and soon extended along the whole front of the two armies. After a desperate struggle the Swedes were utterly defeated, large numbers being slain and many more being taken prisoners. The pursuit of the Swedes was vigorously kept up. The *débris* of the army under General Lœvenhaupt had reached Perevolotzna on the banks of the Dnieper, but were unable to cross, before General Prince Mentchikoff with a large force of cavalry, with as many infantry, carried *en croupe*, came up, and summoned them to surrender. After a short parley they surrendered to the number of 14,000 men. The King of Sweden with a handful of men succeeded in escaping into Turkey.

The victory was one of the most decisive in the world's history, and shows great military ability on the part of the Emperor, in the skilful manner in which he arranged his redoubts, and supported his cavalry with artillery and infantry. In fact we see in this battle a further development of the idea of the mutual support between the mounted and infantry services.

CHAPTER XVIII.

PETER THE GREAT.—THE REGULAR ARMY IN RUSSIA.

THERE was no really effective regular army in Russia before the reign of Peter the Great, and to that celebrated monarch is due the credit of having established the Russian army upon a permanent and effective footing.

Dmitry Donskoi was the first that divided the army (*voisko*) into regiments (*polke*). Before the Tartar invasion the principal strength of the army was the infantry, but after that time the cavalry composed the main force.[1] There was, however, no regular army properly organised till the reign of Peter the Great. He established it upon a true military basis, and taught it to fight, not in the manner of irregular levies, but upon the correct principles of the art of war.

When Peter ascended the throne the army consisted of two dragoon regiments and twenty-seven infantry. The great Czar at once perceived the extreme weakness of his cavalry force, and the value of the mounted soldiers to an army. He therefore very soon began to increase his dragoons. Eight regiments were organised in 1701.[2] The next year he added another. The following year two more dragoon regiments were formed. In 1704, four more. In 1705, six. In 1706 and the following year six more, and in 1711 another. This made a total increase of from two regiments only in 1700, to thirty regiments in 1711. He also organised in 1709 three regiments of dragoon grenadiers. These carried no flags.[3]

The dragoons were organised for the express purpose of fighting both on foot and on horseback, their arms and equipment being specially designed for that object. They had muskets with which they fought when dismounted, and long straight swords and pistols, for use when fighting as cavalry on horseback. The intention of using them principally as dragoons, and upon foot, is clearly shown by the fact that

[1] Ivanhoff, 3. [2] Ibid. 15. [3] Ibid.

one-fifth of the men carried axes, one-tenth of them large shovels, and one-tenth spades, all carried in the same way attached to the saddles. These implements were evidently intended to enable the dragoons to cut down abattis, and throw up field entrenchments to cover them when using their muskets in defending important posts.[1]. From 1700 till 1708 the muskets were provided with a species of sword-bayonet, which served both as a sword and as a bayonet.

The dragoons were clad in blue coats; the collars, facings, and linings being of white or red. The vest and trousers were of chamois leather. Spurred boots were also worn; the head-dress was a three-cornered hat. In 1802, this was changed for the casque. After the year 1708, the muskets were provided with a bayonet like that used by the Swedes. The ensigns, paymasters, standard-bearers, sergeants, and corporals of the dragoon regiments were not provided with fusils, but used the pistol only in addition to their swords.

The formation of these regiments was in three ranks, except when the men were dismounted and formed up to fight on foot, in which case they were accustomed to be ranged in four ranks.

The proportion of the cavalry to the infantry in Peter the Great's time was very great. In the year 1720 the infantry were only 57,956 in number, while the cavalry comprised 36,333 horsemen.[2] This is an evidence of the high value placed upon the mounted force by one of the greatest soldiers in the world's history.

Peter the Great, while fully appreciating the value of dragoons, also understood equally well the great advantage of an effective force of light cavalry. He had large numbers of irregular horsemen in the Cossacks, but desiring some regular light cavalry, he ordered, in 1707, the organisation of 300 light horse, composed of Hungarians, Servians, Moldavians, and Wallachians. In 1711 he increased this force to eight regiments. They were soon reduced, however, as the expense of maintaining them was very great.

Peter's appreciation of the value of these light horsemen was however so great, that in 1723 he again authorised the the formation of a corps of hussars, giving land to those who had families, and to them all the same pay as was given in the Austrian army at the time. He had the intention also of raising a large regular force of hussars, but it was never done till the year 1740.[3]

In 1721 the life-guard regiment of horse was organised, and was composed of noblemen, the idea being that the

[1] Ivanhoff, 27. [2] Ibid. 36. [3] Ibid. 38.

regiment should serve as a sort of school, to teach and prepare the officers for the cavalry service. This system was in operation for nine years.

The light cavalry were employed in outpost service, and in the minor operations of a campaign, while the dragoons were employed more for use on the field of battle. The cavalry were generally placed on the flanks of the army. On approaching the enemy the cavalry usually attacked at once, and if checked, fell back upon the support of the infantry, who received the attack, and if overmatched, retired in good order. The Russian troops at this period were not very proficient in manœuvring in the open field, but were very steady, fought bravely in repelling an attack, and defended fortifications with the most dogged pertinacity. Peter the Great used this capacity of his troops with wonderful skill, at the battle of Pultowa, where it will be remembered he employed a number of detached redoubts to strengthen his line of battle.[1]

At one period Peter the Great had the enormous force of 84,000 cavalry of all kinds in his army.[2]

The Russian cavalry did very good service in the attack made by the Russian army upon the Swedish General Lœvenhaupt, who was endeavouring to convoy a large quantity of stores to King Charles XII., in Sept., 1708. A skirmish took place on the banks of the Rysta, where the Swedish commander had drawn up his rear-guard in battle array to check the advancing Russians, and give time to the trains to get away. On the morning of the 27th Sept., the Russian dragoons came up, and began to fire with both musketry and guns. After a severe skirmish Lœvenhaupt fell back to Lessnoy, where he concentrated his troops for a desperate fight.

The Czar followed him closely. To hide the advance of his troops, he despatched 1,000 dragoons under Colonel Campbell. The Russian column consisted of an infantry regiment, a dragoon regiment, and two guards regiments. On account of the character of the ground, Peter the Great ordered the dragoons to dismount, and to form up in battle order alongside of the infantry. A severe struggle took place, in which the dismounted dragoons fought well in line of battle as infantry, and the fight ended in the success of the Russians, who drove the Swedish advanced guard back upon their main force. After a very bravely contested action with varying success, the night separated the combatants, and under cover of it the Swedes retreated, leaving behind them all their baggage. The next day, being closely pursued,

[1] Goudim Leffcovitch, 38. [2] Ibid.

Lœvenhaupt abandoned his convoy, which he burned, and continued his retreat, being closely followed by some regiments of Russian dragoons, and a force of Calmucks and Cossacks, under General Floug, who came up with the rear-guard at Propoyske and defeated it.

This was a most important instance of the destruction of a convoy, for the supplies lost were immense, and the blow to the Swedish army irreparable. In this affair the cavalry took a great part.

CHAPTER XIX.

MARSHAL SAXE—HIS IDEAS ON CAVALRY.

MARSHAL SAXE was an able general, and being a careful observer as well as a profound thinker, he was very quick to discover faults and abuses, and to see the reforms required. His writings show a keen appreciation of the principles of the military art, and are the best works on the science of war that were published in his time.

Among other reforms, Marshal Saxe introduced the cadenced step into the French army,[1] and it soon became the common practice in most countries. He also re-established the lance as a cavalry weapon, it having disappeared long before his time. He called the cavalry so armed, Uhlans; they are still in use in some of the armies of Europe, under the same name.

His ideas as to the organisation and armament of cavalry, as well as its method of fighting, were very good, and prove that he well understood the characteristics of that arm. He considered that cavalry should be lightly armed and equipped, in order to endure fatigue and to make rapid marches, and be kept continually exercised and hardened so as to be always in good training.[2]

He divided cavalry into two kinds, heavy cavalry and dragoons. The heavy, being costly to maintain, was not required in large numbers. It was to be mounted on strong powerful horses, trained to simple and solid movements, to keep close together, and never to lose its order, or to become scattered.[3] This force, like the heavy artillery, was to be kept with the main army, never to be used for escorts, for detachments or reconnaissances, but only for the charge in regular engagements.

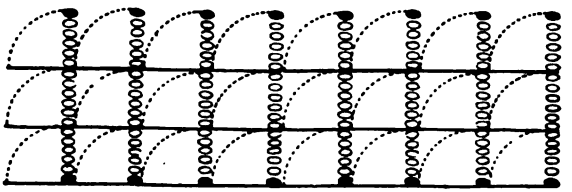
The heavy horsemen he armed with cuirasses and helmets,—the front ranks with lances. He supplied them also with a good sword, four feet in length, a carbine, but no

[1] Rocquancourt, i. 177. [2] Saxe's Reveries, i. 130, 131. [3] Ibid. 133.

pistols.[1] The men were to be carefully chosen, five feet six or seven inches in height, and not corpulent.

The dragoons, according to the Marshal, were to be twice as numerous as the heavy cavalry, and mounted on small active horses. Their manœuvres were to be effected with celerity, and they were required to understand the evolutions of the infantry service, as well as those of the cavalry. He armed them with the musket, sword, and lance; the latter weapon to serve them as pikes, when fighting on foot. The men, he says, were to be small, about five feet or five feet and an inch high. The cavalry and dragoons he ranged both alike in three ranks.

When the dragoons dismounted they formed with their ranks open, so that they could wheel to the right by half-quarters, or one-eighth of the front of each rank, by which



the squadron would be formed in eight ranks facing the right. They then dismounted, fastened their horses together, and formed up where the squadron had formerly fronted, the right-hand man of these rows and the left remained mounted and took charge of the horses.[2] To the dragoons he committed all the minor services of the army, the escorts and reconnoitring and outpost duties.

The Marshal does not explain clearly how his dragoons were to use the musket, lance, and sword on foot; he certainly could not have meant that they were all to have dismounted and fought overburdened with so many weapons. His idea evidently was to have the front rank armed with lances, the rear ranks with muskets, and when dismounted they were to form, like the infantry regiments of the preceding age, a mixed force of pikemen and musketeers.

Marshal Saxe argued in favour of armour, but his reasons for urging its use were novel. He considered that, if the horsemen could be defended from sword and lance thrusts by moderately light defensive armour, it would force hostile cavalry not so armed to rely altogether upon firearms; and as he held the view that cavalry which relied upon missile

[1] Saxe's Reveries, i. 134. [2] Ibid. i. 136, 137.

weapons would always be beaten by a bold charge, he thought that heavy armed cavalry who, regardless of the fire, rode boldly on would soon put their enemies to flight with comparatively slight loss. He seems to have forgotten in his theory that just in the proportion in which he increased and strengthened the armour would the mobility be diminished, and there would be left to the lightly equipped horsemen increased range of projectile weapons and greater mobility. It has been already shown in the account of the Parthians, what is the result of the judicious application of these two advantages.

Marshal Saxe invented a carbine which loaded at the breech, and supplied his regiment of Uhlans with it. It had many inconveniences, most probably caused by the defective mechanical skill of the time.[1] He had the carbines carried on a bandolier. The lances, which were twelve feet long, weighed about six pounds, and served as tent poles, saving thereby the carriage of poles for that purpose.[2]

His instructions for the guidance of cavalry on the march are very good, the closest attention being enjoined to the preservation of a steady and uniform pace. He also taught cavalry the caracol, and wheeling to the right and left by the half-quarters or eighths of ranks, to take ground in either direction, and, in the case of dragoons as already mentioned, when it was desired, to dismount them for action.

When the cavalry charged, Saxe could not impress too forcibly upon them the importance of keeping together, and of never pursuing in disorder. The standard, he said, should be their principal thought, and they should always rally to it. In charging they started at a slow trot and gradually increased the pace to the gallop. At twenty or thirty paces from the enemy they closed together at full speed. The Marshal held that cavalry should be taught to gallop for long distances in good order, and said that any squadron that could not charge 2,000 paces at full speed without breaking was not fit for active service.[3] He considered this an absolute necessity in the heavy cavalry as well as in the dragoons, who were expected to be able to skirmish with facility; their third rank being specially drilled to work in open order, and to retire rapidly and form up in rear.

He advised that the horses should be continually exercised in winter to keep them in training, and that they should be thoroughly accustomed to the firing of musketry and cannon, so that the noise, fire, and smoke should have no effect upon them.

[1] Lloyd, i. xi. [2] Saxe, i. 147. [3] Ibid. 166.

The impetuous energy of Charles XII., and the writings of Marshal Saxe, gave to the cavalry service much greater mobility, and without doubt must have had a very marked influence upon Frederick the Great, to whom was reserved the credit of restoring to cavalry its value and reputation, after 2,000 years of vicissitudes and fluctuations. He did away with many false ideas, and revived, in equal if not greater splendour, the glories of that service which, in the time of Hannibal and Alexander, effected such important results and won so imperishable a renown.

The improvements in armament, in organisation, and in tactics culminated under Frederick the Great. In the next period we will trace the operations of the cavalry under the influence of what may be termed the Prussian or Frederick's system, which for so many years has been the guiding principle of the cavalry service in most armies.

PERIOD IV.

FROM FREDERICK THE GREAT TILL THE INTRODUCTION OF RIFLED FIREARMS, 1740 *TO* 1854.

CHAPTER XX.

CAVALRY UNDER FREDERICK THE GREAT.

SECTION I.—ORGANISATION AND TACTICS OF HIS CAVALRY

WHEN Frederick the Great ascended the Prussian throne he found his army very highly disciplined and capable of manœuvring with considerable precision, but the system of tactics was very faulty. The cavalry was composed of large men mounted upon powerful horses, and carefully trained to fire in line both on foot and on horseback. The force was of the heaviest type and quite incapable of rapid movement. In fact, the cavalry of all European States had degenerated into unwieldy masses of horsemen, who, unable to move at speed, charged at a slow trot and fought only with pistol and carbine.

Frederick, who in his first battle at Molwitz interlaced battalions of infantry among his cavalry, and with good results, was not long in seeing the error of this system of fighting; and following the example set him by Charles XII. of Sweden, he began to effect those reforms in his cavalry which soon made them the most efficient body of horsemen that ever existed.

His first change was to prohibit absolutely the use of firearms mounted, and to rely upon the charge at full speed, sword in hand. He taught his horsemen to disregard the fire of the enemy's squadrons, and to rush in with the utmost vigour, and in order that this charge at speed should be as effective as possible, he lightened the equipment and arma-

ment of his soldiers, and took every possible measure to enable them to move rapidly and in good order over every kind of ground.

His great care was to train his squadrons of cavalry to preserve a close order, and a correct alignment in an advance of considerable distance. By constant attention and continual drilling, the Prussian cavalry were able when the Seven Years' War commenced, to go through all their manœuvres in perfect order at full speed.

Guibert, in his Eulogy of the King of Prussia, describes the extraordinary perfection in manœuvring the cavalry had attained under his careful instruction. He says: "It is only in Prussia that the horsemen and their officers have that confidence, that boldness in managing their horses, that they seem to be confounded with them, and to recall the idea of the centaurs." "It is only there that sixty or eighty squadrons of 130 or 140 effective men each can be seen going through the manœuvres that a whole wing of cavalry well commanded can execute in the field. It is only there that 8,000 or 10,000 horsemen can be seen making general charges for many hundreds of yards, and halt after making them in perfect order, and immediately commence a second movement against a new line of the enemy which is supposed to present itself. In all his camps, at all his reviews, wherever Frederick sees his cavalry, it is to these important charges in large numbers that he gives the most attention, these that he values the most highly."

Marshal Saxe had already laid down the principle that cavalry, to be of service, should be capable of charging at speed for 2,000 yards in good order. Frederick saw the importance of this idea, and used every effort to reach this standard. His older generals opposed his innovations, but he was ably supported and assisted by Seidlitz and Ziethen, and when such a monarch and such generals of cavalry appeared in the same army, it is not surprising that the world was soon ringing with the fame of the horsemen, who were organised, trained, and commanded by such brilliant and impetuous leaders. Out of twenty-two great battles fought by Frederick, his cavalry won at least fifteen of them.[1]

Cavalry at this time reached its zenith. Everything had paved the way for it, and it only required the genius to see the opening, and take advantage of it, to give cavalry the greatest successes. For nearly fifty years both the horse and foot in all armies had been relying mainly on firearms. The infantry had abandoned the pike, and adopted the bayonet,

[1] Nolan.

which, although a good enough defence against cavalry charging at a slow trot, was not very available against a charge at full speed. The slow and unwieldy horsemen, against whom Seidlitz and Ziethen led the active cavalry of the great Frederick, could not with their useless and clumsy pistols and carbines check the advance of charging squadrons, which, inspirited by their rapid movement, would be carried violently through the hostile ranks. Warnery says, and we can well believe him, "Experience has convinced me in more than a hundred occasions, for I have never seen a squadron depend upon its fire, that it has not been overthrown by that which came upon it at speed without firing."

The infantry also, unaccustomed to the new style of fighting, would at first be taken by surprise and defeated; and once broken, the carnage would be so great as to have a very serious moral effect upon the remainder of the army. One or two successes would so improve the *morale* of the cavalry, and so dispirit the infantry, that in every succeeding action the horsemen would more easily break the ranks of the foot soldiers, and in the confidence of success, the charge would be so boldly and violently given as to crush everything before it. This has evidently been one reason of the wonderful and continual successes of the cavalry under the great Seidlitz and the other Prussian leaders during the Seven Years' War.

At no time in ancient or modern history, not even in the wars of Hannibal and Alexander, have more brilliant deeds been performed by the cavalry than were achieved by the horsemen of Frederick the Great in his later wars; and the secret of their success lay in the careful training of the individual soldier, in the constant manœuvring in masses, in the reliance upon the sword, and in the fiery energy as well as the prudent judgment of the great generals who commanded it.

In Frederick's first battle, Mollwitz, where his cavalry were still in the unwieldy state in which he had found them on his accession to the throne, the Imperial cavalry, who had gained some experience in fighting against the Turks, charged the Prussian horsemen with the sword, and defeated them. This probably had a great impression upon Frederick, and most likely led to his making so many changes in his tactics.

Frederick not only ordered his cavalry to charge, sword in hand, but he recommended his officers always to be the first to charge;[1] he being of the opinion that the offensive was the proper, and only principle, on which cavalry should act.

[1] Duparcq, ii. 295.

He encouraged his horsemen to the utmost, as may be gathered from the following passages in his regulations for his cavalry. "They will move off at a fast trot, and charge at the gallop, being careful to be always well closed together. *His Majesty will guarantee that the enemy will be beaten every time they are charged in this way.*" In a note to this is the following inspiriting addition: "N.B.—If it is found that any soldier is not doing his duty, or is wishing to fly, the first officer or sub-officer who perceives it will pass his sword through his body." It will be seen by these extracts,[1] that Frederick used every available means to encourage his cavalry to perform great deeds.

Under this system it can readily be conceived how soon the Prussian cavalry, compact and charging impetuously, would acquire a great superiority over the Germans with their slow movements, and over the French horsemen with their loose and scattered formation: for the French at this time had two modes of attack—close and at a trot, which they called *en muraille*, and at speed and dispersed, which they termed *en fourageurs*. The Prussian hussars and light cavalry soon learned to charge boldly against the heaviest Austrian cuirassiers and dragoons, whom they often overthrew and routed.

In addition to his changes in the general principle of using his cavalry, Frederick made many valuable improvements in their organisation and method of tactical formation. The force consisted of cuirassiers, dragoons, and hussars. A regiment of cuirassiers contained five squadrons, each comprising two companies of seventy men each. They were usually formed up in three ranks, the third being retained to fill gaps that might appear in the front ranks in the charge. The pace of the charge being increased to the gallop made this formation in three ranks very difficult to preserve, the second rank between the other two being much constrained. Thus the formation upon two ranks was soon the necessary sequence of the increased mobility of the cavalry service, and was adopted both in France and Prussia, in the latter part of the Seven Years' War.[2]

In operating on the field of battle, Frederick ordered that in the charge the cavalry should form in two lines, the first with very small intervals between the squadrons, the second in a much more open order; the intervals being about equal to the front of each squadron. The second line formed a reserve through which the first line could retire, and at the same time watched the wings, so as to anticipate a flank

[1] Duparcq, ii. 295. [2] Ibid. 297.

movement, if such should be attempted. The Prussian monarch was very strongly in favour of flank attacks, and commanded his officers to fall upon the enemy in that manner whenever practicable, assuring them that whether on the halt or on the march, an onset upon the enemies' flank would always overthrow them.

In training his cavalry in peace, Frederick often practised them in charging in serried lines without any intervals whatever, rightly judging that, being trained in that way, they would before an enemy manœuvre all the more easily, when formed with small intervals of five or six paces between the squadrons. The squadrons were divided into two divisions of twenty-four files each, which contained two pelotons of twelve files each, and these pelotons were again subdivided into *escouades* or sections of six files.

The cuirassiers, as their name indicates, wore the cuirass or breastplate. They had in each regiment 37 officers, 70 non-commissioned officers, and 12 trumpeters. The most of the dragoon regiments were of the same force, composition and formation, as the cuirassiers. One dragoon regiment, however, had three squadrons, and two others ten squadrons; these were the only exceptions.

The hussars were organised in regiments of ten squadrons each, but the squadrons were not so large. Each regiment contained 51 officers, 110 sub-officers, and 1,440 horses; a much larger proportion of officers than in the Austrian service.

Although Frederick forbade his horsemen to use firearms when together in large bodies, he yet appreciated the importance of availing himself of them among isolated parties of his cavalry, especially when they were serving as flankers, or as videttes; and that they should be efficient, the men were exercised in firing, and taught to load quickly and to aim carefully.

As his cavalry were used continually on outpost duty, on detached service of every kind scattered about in small parties, and often singly as videttes, it was necessary that they should be men in whom every confidence could be placed. They had opportunities almost every day to desert, and were constantly obliged to arrest spies and deserters. They were consequently chosen with great care from among the sons of small landed proprietors and farmers, the parents being held responsible for man and horse in case of desertion. All these points show how carefully Frederick had considered every detail, and how anxious he was to secure a good cavalry force. He was well repaid for his exertions in this

connection, for to his cavalry he owed nearly all his great successes.

Among other improvements in the tactical movements of his cavalry, Frederick is said to have introduced the system of forming line to the front from column by the oblique march of troops or squadrons, across by the straightest line to the position each was to assume in the new alignment. The system, before his day, was to wheel the head of the column to the right or left, and as soon as the whole column was upon the new line to wheel into line. These frequent wheelings and exposures of the flanks to the enemy did not please the king. He wished to avoid showing his flank to the enemy, and to march the shortest way obliquely towards them. When Frederick proposed it to some of his old officers they said it was a thing that had never been either done or thought of. "It has been thought of," said the king, "and shall be done." It was then said that the horsemen would have to be taken to the riding school and drilled for the purpose. "They shall," said the king, "and the horses too." It was then observed that many would get broken limbs before they would be able to perform this manœuvre. "What signifies that," said the king, "if it should be the means of gaining a victory?" The experiment was tried, first with a few and afterwards with a larger number, and succeeded admirably. The above, which is detailed in Count Algarotti's "Letters Military and Political," shows very clearly how energetically Frederick pushed on his reforms, in spite of the traditions and prejudices existing in the army in his time.

The cuirassiers, or heavy cavalry, were generally placed in the first line, the hussars being used on the flanks and in reserve, their principal employment however being in the minor operations of war. The dragoons occupied an intermediate position between the hussars and the cuirassiers, and were employed with both of them. Frederick, more than any other general, used his cavalry in every kind of service, the cuirassiers being often called upon to perform the duty of light horsemen, and the hussars being often used in serried squadrons on the battle field, as if they were heavy cavalry of the line.

The method adopted by Frederick of working his cavalry, of employing them in large masses, and prohibiting them from firing, exposed them more than ever to the deadly effects of the fire of artillery and infantry; and he soon perceived that occasions would arise, in which these two arms would have constant opportunities of opening a destructive fire upon his horsemen, without much chance of retaliation on their

part. To remedy this defect the king saw that it was necessary to discover some auxiliary force that would protect his horsemen altogether, or in part, from this disadvantage. This led to the invention and organisation of horse artillery, which, by its rapidity, could follow all the movements of the cavalry, and camping and fighting with it, would be able to keep the enemy's batteries and infantry at a distance, and by its fire pave the way for the charge of the horsemen. By this invention, which was one of the most striking results of Frederick's genius, the cavalry, without losing in mobility, gained a new and important means of attack and defence. Frederick even attached these batteries of horse artillery to his hussars and light troops.[1]

One of Frederick's cavalry officers, Major-General Warnery, has left some excellent works on military subjects, his "Remarques sur la cavalerie" being the best work of the age on the organisation and tactics of cavalry, and being interesting as illustrating the ideas of the principal Prussian cavalry officers on that subject: for it is generally admitted that the views of Warnery are based upon the opinions of Seidlitz, under whom he served, and with whom he was on terms of close personal friendship. His other works, though of less interest, are valuable. His "Remarques sur le militaire et la marine des Turcs et des Russes" contains much useful information on the military forces of those countries at his epoch. His other works are all on military subjects. His "Campagnes de Frederick II Roi de Prusse de 1756 à 1762" has been very severely criticised, but yet contains a great number of instructive and interesting details.

Warnery had an intense admiration for Seidlitz. He calls him "this grand man" when he refers to him, and says that it was impossible to push the cavalry to greater perfection than did Seidlitz. Speaking of Seidlitz's own regiment, Warnery says, that it served as a model to all the cavalry in the universe. Frederick was particularly fortunate in his choice of officers, his generals Seidlitz and Ziethen being men of extraordinary capacity. The energy and promptness of decision of the former, was well evinced by an incident which occurred when he was quite a young officer, and which is a splendid illustration of the spirit which should animate a cavalry commander. It is translated from Comte de Rochfort's "Idées Pratiques sur la Cavalerie." "Seidlitz, to whom Frederick owed the greater part of his success, was so skilful, so vigorous a horseman, that he could not conceive how an

[1] Rocquancourt, ii. 60.

officer of cavalry could be made prisoner if his horse was not killed.

"Once he expressed this opinion while escorting the king when he was captain of the guard. Frederick, whom nothing escaped, was struck with his remarks, and decided to put him to the proof. The opportunity soon presented itself.

"The escort was obliged to pass over a bridge; the king stopped in the middle of it, and turning towards Seidlitz, who was surrounded in front and rear, said to him:

"'You pretend, Monsieur Seidlitz, that an officer of cavalry ought never to be made prisoner; certainly it is the idea of a brave man, nevertheless there are occasions where one could surrender without dishonour. Suppose, for instance, that we were enemies, you would not attempt to pass by force. What would you do then?'

"Seidlitz, prompt as thought, drove in his spurs and threw himself with his horse into the torrent, and without suffering any injury, returned to the retinue near the king, whom he saluted, saying, 'Sire, behold my reply.'"

Seidlitz possessed the secret of knowing when to be bold, even rash, and when to be cautious. No man ever combined prudent and careful judgment with such indomitable energy and impetuosity. In his boyhood he was noted for his bold and adventurous pranks. At seven years of age he rode between the sails of a windmill in full action. At twenty-three he was a major, and had already distinguished himself in several battles. At thirty-two he was colonel commandant of a cuirassier regiment. At thirty-five he was made a lieutenant-general and commander-in-chief of the cavalry.[1] His most brilliant action was the battle of Rosbach, in 1757, where with the horsemen alone he won a most decisive victory. His expedition against Gotha, where with 1,500 men he captured a town strongly occupied with infantry and artillery, was another of his bold exploits, his whole dispositions showing the greatest ability.

Ziethen was one of Frederick's favourite cavalry generals, and united, says his biographer, "wisdom with courage, contempt of danger with perseverance, and dexterity with presence of mind, and activity with the most perfect command of temper. He conceived his plans with the progressiveness of the rising storm, and executed them with the rapidity of the thunderbolt."[2] He was colonel for a time of the celebrated Ziethen hussars, called the "death's-head hussars." He served upwards of seventy years, and died at the age of eighty-six. His promptness of decision was remarkable.

[1] Beamish, 42, 43. [2] Ibid. 44.

He once said to the king, "The moment I see the enemy my dispositions are already made." This quick *coup d'œil* was the secret of his great success as a general of horse.

In the account of Frederick's campaigns and battles the name of Ziethen continually appears and always most creditably. In reference to some of these actions we shall have to refer more particularly to his exploits.

Under Frederick the Great we find a very marked change in the manner of drilling the individual horsemen and so preparing the units carefully before manœuvring them together in large masses. Frederick seems to have been the first to bestow great attention to the instruction of each cavalry soldier in horsemanship and in the use of his sword. In the days of chivalry we know that the knights were drilled and exercised from the age of fourteen with constant care in riding, and in the use of the lance, sword, mace, and battle-axe, and they were probably as skilful in the use of their chargers and weapons as the cavaliers of the Prussian monarch; but they were trained only for single combat, their skill was intended only to perfect them in individual feats of arms. Frederick made a great step in advance when he made the individual training merely the foundation of, and the preparation for, rapid manœuvring and fighting in enormous masses.

After the peace of Dresden great attention was paid to the horsemanship of the cavalry. In every regiment a riding school was established, and rough riders and riding masters were appointed, by whom the men and horses were continually exercised;[1] the soldiers being taught every detail of the equestrian art and being constantly practised in swordmanship when mounted. By this means each particular horseman acquired a personal confidence in his own powers in the management of his horse as well as in his ability to defend himself with his sword. In fact, no soldier was admitted into the regiment to go through field manœuvres until he was individually thoroughly instructed and well established in his seat in the saddle.

The great care bestowed upon the training of both horses and men in the riding schools was the secret of the ability of the Prussian cavalry to manœuvre in large bodies with such remarkable speed. They were able, as already stated, to perform all the evolutions required in the field at the gallop in good order and with perfect alignment.[2]

Seidlitz and Ziethen both bestowed great attention to the instruction of the cavalry. After the men had been well

[1] Beamish, 358. [2] Rocquancourt, Humbert, 105.

trained in the riding schools, they were manœuvred in large masses over rough ground to prepare them for service before an enemy. Seidlitz was accustomed to exercise his regiment at full speed over very broken ground, and men were often killed. Frederick once found fault with him on account of the number of deaths so occasioned. Seidlitz coolly answered—"If you make such a fuss about a few broken necks, your Majesty will never have the bold horsemen you require for the field." This anecdote is a striking illustration of the spirit in which the cavalry of the great Frederick were trained and handled.[1]

As already mentioned, the cavalry on level plains sometimes charged in close line without intervals, or, as the French say, *en muraille*, as Seidlitz did at Zorndorf in 1758 with seventy squadrons in closely serried order, a fact that speaks volumes as to the manœuvring powers of the Prussian horse.[2] The intervals between the squadrons varied, being regulated evidently by the nature of the ground and the tactics of the enemy.

The cavalry generally retreated, in case of need, by échelons, and were taught to rally to the front instead of to the rear, or, in other words, to rally after a charge while pursuing; a most important precaution, tending to prevent a reckless and disorderly pursuit and enabling a commander to follow up a victory with greater certainty, to resist an attack of the enemy's reserves with more chances of success, or to turn against the flank or rear of any body of the enemy's troops which their advance might enable them to attack with advantage.

The system of elementary tactics in the Prussian cavalry was alike in all the various kinds, the cuirassier being trained exactly the same as the hussar; speed, orderly manœuvres, charges in line, or *en fourageurs*, being equally required from both. They were all drilled to charge across ditches, to leap hedges, to cross hollow roads, villages, and defiles, to search woods, to make reconnaissances, in fact, to do everything they might be called upon to perform before an enemy.[3]

It can readily be imagined what power a force of cavalry so drilled would have in action when led by energetic commanders, and when relying upon the sword and close hand-to-hand fighting. These horsemen soon learned to despise the use of firearms, and to disregard them in the hands of their opponents. When we learn the particulars of Frederick's preparations for war, and the extraordinary care bestowed by him upon his troops, we no longer wonder at his

[1] Nolan, 33. [2] Humbert, 105. [3] Warnery, 73.

remarkable successes, and feel that he had fairly earned them.

Having recounted the changes made by Frederick in the art of war, particularly in the organisation, armament, and tactics of his cavalry, it will be instructive to follow them into the field, and, in tracing the result of his reforms, refer to a few of the more brilliant successes of his horsemen, which all convey lessons of value to the cavalry officer.

SECTION II.—ACTIONS OF PRUSSIAN CAVALRY—BATTLES OF HOHENFRIEDBERG, SOHR, HOCHKIRCH, PRAGUE, LEUTHEN, AND ZORNDORF.

The battle of Hohenfriedberg, fought on the 4th June 1745, was won by Frederick, and to a great extent through the services rendered by the cavalry. Ziethen, with the cavalry of the left wing, crossing Strigau water by a ford, at once charged fiercely upon the Austrian right over difficult ground. The Austrians, unaccustomed to such vigorous treatment, were soon thrown into confusion and routed. They excused themselves by saying, "We could not charge the Prussians, partly because of the morasses that lay between us, and partly because they rushed across and charged us." They were evidently discouraged, in fact dismayed, by the confident way in which the Prussians came on, as if sure of success.[1] In some parts of the field the Austrian regiments would not charge at all, but merely kept firing their carbines at the halt, and when the time came ran.[2]

This action shows that the Prussian training enabled their horsemen to attack over ground that the Austrian cavalry could not operate upon, and compelled the latter to await the charge at the halt, and consequently to be beaten. In the centre of the army, the cavalry of Frederick also performed the most important services. Lieutenant-General Gessler, with the dragoon regiment of Baireuth, was in the second line, and happened to be exactly in the rear of a gap that had opened in the Prussian front during the manœuvring that preceded the general attack. While watching the result of the close struggle that was going on desperately between the opposing lines of infantry, he saw the battalions in front of him getting shaky and confused, the heavy fire of the Prussians and the stress of battle beginning to tell heavily upon them. The instant had arrived for action; requesting the infantry to open the gap a little wider to give him room, he led his horsemen through in two columns, sabre

[1] Carlyle, iv. 118. [2] Ibid.

in hand, with fierce impetuosity, and dashed pell-mell into the wavering Austrians. Everything gave way at once, twenty battalions were broken instantly, and thousands of prisoners taken, with standards, kettle-drums, &c. That charge turned the fate of the battle, and the Austrian commander drew off the shattered remains of his army as best he could.[1]

The contrast between the cavalry of the Prussians and that of the Austrians is very marked in this action, and shows how much superior the horsemen of Frederick were upon the field of battle in all that constitutes a good cavalry force.

At the battle of Sohr, on the 30th September, 1745, another splendid illustration was given of the superiority of the Prussians in the field. The Austrian army through the night had glided around Frederick's right flank through the woods, in perfect silence without even a pipe lit, and with a thick veil of hussars in front. They secured a lodgment on some heights on the Prussian right, and soon placed twenty-eight guns in position with fifty squadrons of horse in three lines forming their left wing. Frederick was obliged under fire of cannon to change his front to the right, the Austrian horse sitting idly in their saddles watching the hurried manœuvre. Not so with the Prussians. The king ordered Buddenbrock to charge them up hill with his cuirassiers. That general and his horsemen went into them at a furious rate. The Austrians made no countercharge, no advance, but stood motionless in their ranks and opened a sputtering fire of carbines upon the rapidly advancing foe. Buddenbrock's followers paid no attention to the fire, but crashed through them in an instant, tumbled them back in wild confusion, back upon the second line, and rolled both further back upon the third and swept the whole mass off the heights clear away into the forest, out of which they returned no more during the action.[2] This one charge of cavalry turned the scale, the infantry soon captured the battery, and the whole Austrian left was driven from the field. Buddenbrock's cavalry had not yet finished their work, however; having nothing further to do upon the right, they were moved rapidly across to the Prussian left, which had been refused up to that time. Reinforced by Buddenbrock the left wing of the Prussian cavalry dashed vehemently against the cavalry of the Austrian right, who did not stand the storming rush of the Prussian horsemen, but wavered and broke in flight towards the woods in the rear. The Prussians did not follow them, but turned to the right upon the exposed flank of the

[1] Carlyle, iv. 119. [2] Ibid. 145.

Austrian infantry, rolled it up, cut off a slice of about 2,000 prisoners, and put the remainder to flight.[1] This was the final blow that settled the victory, and is as good an example of skilful cavalry tactics as any we have met with in our researches.

In the surprise of Hochkirch, 14th October, 1758, the Austrian army again turned Frederick's right wing, and attacking in the night, drove his army from the ground. Here, again, however, the cavalry performed the most valuable services, checking the advance of the attacking force very materially, and thereby preventing a serious disaster. Ziethen, with his usual vigilance and caution, had his hussars all dressed, their horses saddled and ready on the first alarm to ride into action, and was soon charging in his vigorous style, dashing in upon the Austrians so vehemently, that they could do nothing in his part of the field, and Frederick was able when the day broke to withdraw his army in good order into a new position.[2] Had it not been for the bravery and vigilance of Ziethen and his hussars, this retreat could hardly have been accomplished without irreparable losses

At the battle of Prague, 6th May, 1757, there was some very heavy cavalry fighting on the left wing of the Prussian army, which had turned the Austrian right by a flank march in broad daylight. The Austrians, on seeing the manœuvre the enemy were carrying out, at once hurried their cavalry to the right wing, which was thrown back and formed at right angles to the original line. The horsemen, to the number of 104 squadrons, were arranged in three lines, with intervals equal to the front of a squadron.

The Prussian cavalry of that wing, under Prince Schonaich, comprised only sixty-five squadrons, but in their usual furious style they charged at once at full speed. The Austrians stood still until the advancing horsemen came within fifty paces, when they poured in a volley with carbines, and then advanced at good pace against them. Being outflanked by superior numbers, the Prussians were checked, and twice repulsed. In the third attack, however, General Ziethen, with his hussars and a regiment of dragoons, charged with such vigour that the Austrian cavalry were entirely defeated and driven back upon their own infantry, throwing their lines into great confusion. General Warnery gives the particulars of a very interesting attack made by his regiment upon the hussars of Haddick, in which he skirted a pond, resting his right upon it as he made the circuit to prevent his being outflanked.[3] The action of Warnery's regiment tended

[1] Carlyle, iv. 146. [2] Ibid. v. 292. [3] Warnery, 108, 109, 110.

materially to the success of the Prussian cavalry in this action.

The battle of Rosbach, 5th November, 1757, was probably of all others that in which the cavalry exercised the most important influence, for it was won almost entirely by that arm; a very few regiments of infantry having come up in time to take part in the affair. The allied forces moved to their own right, in order to turn the left flank of Frederick's army. The Prussian king soon saw their intention, and immediately made his arrangements to frustrate their design. He moved his cavalry rapidly behind some hills which concealed their march, and formed them up in lines, exactly across the route by which the allied forces were advancing. On their near approach, the Prussian cavalry, led by Seidlitz, attacked vehemently the heads of the columns before they had time to deploy, and drove them back in confusion. They attempted to rally, but the Prussians renewed the attack so quickly that all their efforts to re-form were ineffectual, and they were routed. The allied infantry then endeavoured to form, but Frederick attacking them promptly with six or eight battalions which had come up, was able, with the assistance of the cavalry and the artillery, to break the few troops which attempted to deploy at the heads of the columns, and soon drove them back in rout.

Prince Soubise, who commanded the allies, moved up his reserve of cavalry in the hope of restoring the action, and giving time to his troops to rally and deploy, but the Prussian horse soon dashed in upon them, and sent them off in headlong flight. It was then all over, the approach of night alone staying the pursuit.

The next day at dawn the king, with the hussars and dragoons, followed the retiring enemy. He soon came upon the French rear-guard, who were posted in some inclosed gardens and in a château. Frederick, who understood the use of dragoons, as well as all the other arms, immediately dismounted them, and forming them up on foot, drove the enemy from the gardens, and was about attacking the château when they abandoned it, and fled across the river Unstrut, burning the bridges behind them. This use of the dragoon is instructive, as showing that the highest appreciation of the use of the *armes blanches* did not prevent Frederick from using firearms on occasions where their use was likely to be the most advantageous.

Beronhorst, speaking of this action, well describes the spirit of the Prussian system of cavalry tactics: "The genius of the Prussian cavalry sprang forth here from the fields of Reichardt-

swerben, and led them on to victory. When the cavalry in order of battle, like a pent-up flood, is held ready, and at the first signal poured down in torrents, floods the fields, sweeping all before it, then has cavalry reached the ideal of perfection, and to this ideal Seidlitz attained with the Prussian cavalry on that day."[1]

At Leuthen on the 5th December, 1757, Frederick won a great victory over the Austrians by a skilful employment of the oblique order of battle. In this action the Prussian cavalry of their right wing were strengthened or supported by four battalions of infantry, which the king had placed in rear of the cavalry of that wing, to protect their flank. These battalions are said to have performed most valuable services, by driving back with their fire a portion of Nadasti's cavalry which had charged the Prussian horse in flank, and had thrown several regiments into confusion. On the left wing Frederick had posted Driesen, with a force of cavalry to protect the flank of his infantry, and with strict injunctions to take nothing else in hand.

Driesen, drawn up in a hollow, waited patiently till Luchesi with the numerous cavalry of the Austrian right, charged upon the flank of the Prussian infantry, waited until he galloped by and was met by the storm of bullets from the Prussian line. Then in perfect order he emerged, and charged vehemently upon the flank and rear of the Austrian horsemen. Utterly astonished and confounded with heavy fire in front, and Prussian steel in rear, they turned in flight and scattered in every direction.[2]

The cavalry in this, as in all Frederick's battles, contributed very materially to the victory, and were bravely led and skilfully commanded. The Austrians were learning by this time something of the spirit in which cavalry should be handled, for it appears that on their left Nadasti dashed out with his cavalry upon Ziethen, before Ziethen charged, and it was in that charge that the Prussian horse owed something to the assistance of the four infantry battalions placed in their rear.

Seidlitz virtually decided the battle of Zorndorf by a charge of his cuirassiers. The Russians had made a desperate charge upon the Prussian lines, and so fierce was the onset that the king's infantry were compelled to retire in disorder. This occasioned a considerable opening in the Prussian line, and left their whole left flank uncovered.[3] The Russians, confident of victory, plunged wildly forward with loud shouts of triumph, sweeping all before them, and capturing twenty-

[1] Nolan, 36. [2] Carlyle, v. 204. [3] Towers, ii. 116.

six pieces of cannon. The day seemed irretrievably lost, when Seidlitz, who with about 5,000 horse had got across the marshy Zabern hollow, dashed vehemently upon the flank of the advancing Russians, who in the flush of success had lost their order, and were in confused masses. In an instant they were thrown into utter ruin, by the rushing squadrons, led by the impetuous Seidlitz.

They fought bravely, however, refusing to fly, the Prussian horsemen sabring them, till from very fatigue they were obliged to desist.[1]

After this the second line or rear half of the quadrilateral into which the Russian army was formed, was brought up in good order to make another effort to win the day. Frederick brought up his right wing and made rapid preparations to attack again. His infantry were just getting within musket range when the Russian cavalry, supported by their foot, charged boldly against the coming attack. This charge checked the Prussian advance, broke through their centre, and a battery and a battalion of infantry were taken prisoners. Frederick rushed forward and personally tried to rally his troops, but without success. The fate of the day was again trembling in the balance, when again Seidlitz appeared at the head of sixty-one squadrons, brought from the other end of the field, and charging swiftly upon the victorious Russian cavalry, drove them back before him, back into the morasses of the Mutzel, so that they returned no more during the battle. Frederick openly acknowledged that he owed his success to Seidlitz. This action was so closely contested and so indecisive, that both sides claimed the victory.

[1] Carlyle, v. 267.

CHAPTER XXI.

AUSTRIAN CAVALRY IN FREDERICK THE GREAT'S WARS.

THE cavalry in the Austrian army at this epoch consisted of cuirassiers, dragoons, and hussars. At the celebrated battle of Prague, the horsemen were in the following proportions: seventy-seven squadrons of cuirassiers, forty-two squadrons of dragoons, and thirty-five squadrons of hussars.

There was a marked difference in the cavalry of the Prussian and Austrian services. Frederick, as we are aware, had devoted his principal efforts to render his cavalry effective in manœuvring, and charging in large masses upon the field. The great attention bestowed upon this point caused less care to be taken in training them fully in the minor duties that fall upon cavalry. They were consequently not so well trained in outpost and reconnoitring work.

The Austrian army, on the contrary, had large bodies of irregular light cavalry, quite incapable of withstanding in the open plain the impetuous rush of the serried squadrons of the Prussian king; but in scouting, reconnoitring, and covering the front of an army, they were more than a match for their opponents. They excelled in swarming about in woods and broken ground, attacking detached parties whenever opportunities occurred, but if vigorously pressed they usually fell back, leisurely taking advantage of every inequality of the ground to cover their retreat.

The well-performed outpost service of the Austrians was of incalculable value to them, and Frederick was continually incurring terrible risks through his weakness in this particular. The splendid material, however, in his cavalry, and their magnificent training and *morale*, almost always on the field of battle secured, by hard fighting, the safety that their ill-managed outpost work often so seriously endangered.

Frederick continually refers to the great difficulties he encountered, through the extraordinary vigilance and dexterity of the Austrian hussars, in concealing the movements

of their army. In 1744, he says, that the Austrians had 10,000 Hungarian hussars, who cut off the communications of his army, in a country much intersected with morasses, forests, hills, and defiles.[1] They were able, he relates, to discover all that passed in his camp, while he could not send out patrols without calculating on the probability of their loss. So that in fact his army was virtually confined to the *enceinte* of the camp. This added enormously to the difficulty of foraging and obtaining provisions.

The Austrians had a force of Uhlans in the Seven Years' War, which were raised among the inhabitants of the Ukraine. In person, dress, and manner of fighting, they resembled the Tartars and Calmucks. They were armed with a lance about fifteen feet long, pistols, sabres, sometimes with carbines, and sometimes, according to General Lloyd, even at that date, with bows and arrows. Large numbers of Croats, a species of irregular light cavalry, also served in the Austrian army in all the wars against Frederick, so that in that type of mounted soldier, the Austrians had a great advantage over him.

In this war the Hungarians organised a corps of mounted riflemen, which rendered most important services. They were armed with rifles having conical touch-holes. They formed a part of the army of the Duke of Brunswick.[2]

Carlyle's history of Frederick the Great teems with references to the excessive difficulty the king had in obtaining information of his enemy's movements. In 1741, on the opening of the campaign, Frederick was in profound ignorance of what was going on beyond his own lines, through the clouds of light troops that infested the whole country in front of him. His scout service could not live among them, his reconnoitring parties were stopped, and the enemy were covered by an impenetrable veil.[3]

In September and October, 1744, Frederick was placed in great straits, through this superiority of the enemy's light cavalry. They lurked in bushy wildernesses, in rocky valleys, in scraggy woods. Driving them off, or defeating them, was all in vain, for they fled rapidly, and returned promptly on the cessation of pursuit. Foraging was almost impossible, and only to be accomplished by sending out whole regiments together to perform the service. Letters and orders could not be carried from point to point without being intercepted. Carlyle states that at this date the irregular horse shut out the light of day, that as many as six orderlies were despatched to an outlying general, and not one of them could get through to him. Three letter-bags destined for the king were taken, so

[1] Frederick's Memoirs, i. 244. [2] Bismarck, 335. [3] Carlyle, iii. 224.

that for four weeks he was absolutely shut out from the rest of Europe, and he knew not in the least what the Emperor, the King of France, or any other king was doing.[1]

At the skirmish at Tein Bridge, the irregular horse attacked the Prussian rear-guard under Ziethen, and although forcing the passage of the river, when they came to close quarters, the iron discipline and steady charges of the well-trained hussars enabled them to beat them off and retire in good order.

In October, 1744, when Frederick took up his position in the camp of Konopischt, he foresaw that his garrisons in Budweis, Tabor, and Frauenberg, would run risk of capture. He sent therefore eight successive messengers with orders to them to rejoin him. The whole eight were captured by Austrian parties of light horse, so that no order arriving, all three garrisons, containing 3,000 men, were taken prisoners.[2]

The whole campaign of 1744 was unfortunate to Frederick, and his ill success seems attributable more to the services of the cavalry of the Austrians as outposts, than to any other cause. Carlyle says: "While old Traun is kept luminous as mid-day, the circumambient atmosphere of Pandours is tenebrific to Frederick, keeps him in perpetual midnight. He has to read his position as with flashes of lightning for most part, a heavily laden, sorely exasperated man."[3]

In the passage of the Elbe by the Austrians at Teinitz on the 19th November, 1744, the light cavalry swam or waded the river, above and below the point at which the passage was effected, and got into the woods in the rear. Ziethen and Wedell, who were defending the passage bravely, sent out scout after scout to bring aid, but every one was killed, so that no help could come, and they were obliged to fall back fighting.

The battle of Sohr we have already seen was a surprise. Thirty thousand Austrians marched around Frederick's right flank under cover of a veil of hussars, who had their outposts squatted in the bushes within 500 yards of the Prussian camp. This was all owing to the excellent qualities of the Austrian cavalry for outpost duty. Frederick was obliged to deploy his lines under a heavy fire of artillery, and would certainly have been defeated had the Austrian cuirassiers and infantry been anything like equal to the Prussians in soldierly skill upon the battle-field.

The battle of Hochkirch was also a surprise, and very similar to that of Sohr, but Zeithen had learned to understand

[1] Carlyle, iv. 26. [2] Ibid 35, 36. [3] Ibid. 37, 38.

his foe, and with sleepless vigilance held his hussars ready, and so saved the army.

General Lloyd, who served in the Austrian army, says that "At the head of 200 chasseurs and 100 dragoons, he, during the whole campaign of 1760, kept so near the King of Prussia's army, that he never lost sight of it for an hour, though the Austrian army, and the corps he belonged to were generally two or three marches off, and though he was always in sight of the enemy, and scarcely a day passed without some skirmish, yet in the course of the campaign he did not lose twenty men."[1]

The above incidents and passages will give an idea of the wonderful skill with which the outpost service was performed by the irregular horsemen who fought under the Austrian flag. Had Frederick been as well provided with light cavalry his successes would have been much greater, and he would rarely have found his army in the dangerous, in fact desperate, situations in which it was so often placed.

In addition to the reconnoitring and advanced post service, in which the Austrian cavalry were so efficient, they were equally effective in another very important branch of the duties of cavalry in a campaign, namely, in detached service, in partisan raids, and in operations in rear of the enemy against his lines of communication.

The most remarkable of these operations was the partisan raid of General Haddick, with about 4,000 men and four cannon, upon Berlin on the 17th October, 1757. His force consisted mainly of Croats, and by concealing his movements as much as possible by marching through the woods, he obtained a good start, and his numbers being unknown were greatly magnified by rumour. General Rochow, commandant of Berlin, had a force under his command equal to that of Haddick and capable of defeating it, but imposed upon by the rumours that had reached him, as well as by the bold front shown by the Austrian leader, who at once attacked the Silesian gate and was soon in possession of the suburb of the city, he retreated to Spandau with the royal family and archives, and left the capital of Prussia to make its own terms with the Austrian commander.

After a good deal of bargaining, Haddick accepted a ransom of 27,000*l.* sterling, and marched off after a halt of twelve hours, skilfully evading any attempt to cut him off and effecting a safe retreat behind the river Spree. The whole affair was most skilfully planned and boldly executed, and had a very great moral effect for a time. It is a proof of

[1] Lloyd, ii. 53.

the excellent capacity of the Austrian cavalry for this kind of service.

The attack and capture of the Prussian convoy under command of Colonel Mosel in its march from Troppau to Olmutz on the 30th June, 1758, was the most important operation of that kind during the Seven Years' War, and had a most decisive effect upon the result of the campaign, compelling as it did the raising of the siege of Olmutz and the retreat of Frederick into Bohemia.

Colonel Mosel set out from Troppau on the 26th June with nearly 4,000 waggons and an escort of eight battalions, 3,000 recruits or convalescents in four battalions, and 1,100 cavalry.[1] Marshall Daun, who commanded the Austrian army, took steps to waylay his march, feeling confident that if he wished to save Olmutz he must raise the siege either by cutting off the convoy or fighting a pitched battle. In the hope of deceiving Frederick he manœuvred as if about to offer battle while he detached Major-General Loudon, the best partisan soldier in his army, to attack the convoy from the west, while Ziskowitz was sent to attack it from the east. Frederick, not deceived by the manœuvres of Daun, and feeling that all depended upon the safe arrival of the convoy, despatched General Ziethen to Colonel Mosel's assistance with twenty squadrons and three battalions.[2]

General Loudon performed his task with great ability; he concealed his march from the Prussians successfully, and on the third day out Colonel Mosel was attacked near Gunersdorf. Loudon occupied the heights which commanded the defile between Bautsch and Alt Liebe, placing his Croats and Hungarians in the woods, and formed his cavalry to the right in the plain, across the road, so as to envelope the head of the column as it debouched from the defile. In the meantime he drew a close cordon of posts across the route between himself and Frederick, and much nearer to Olmutz, so as to prevent the possibility of news being conveyed to the Prussian king of the danger the convoy was about to encounter.[3] These cavalry posts performed this service admirably, so that Frederick only heard of the loss of his convoy a day after it had occurred.

In the first attack, near Bautsch, Loudon was not successful. Mosel's dispositions were so well taken, and his troops fought so bravely, that the Austrians were driven back with the loss of some 500 men. The same evening General Ziethen joined Mosel with strong reinforcements, and both officers halted the

[1] Jomini, Grand Operations, ii. 106. [2] Frederick's Memoirs, ii. 14.
[3] Jomini, Grand Operations, ii. 107, 108.

next day to enable the long train of waggons to close well up. On the morning of the 30th June the whole force set out again, and on entering the defile of Domstœdtel they found no sign of the enemy until about 120 waggons had got out into the plain beyond, when the Austrians appeared upon the heights, and opened a heavy fire of artillery upon the mouth of the defile. Ziethen ordered the waggons to be massed as fast as they came up in front of the defile, and took steps to drive off the attacking forces. His first attack was successful, but being charged in flank by the Saxon dragoons, his troops were driven back upon the train. General Ziskowitz directed his efforts towards the middle of the convoy, while Loudon renewed his attack upon the head. After most obstinate fighting, in which the young recruits fought and died in their ranks without wavering, the overpowering numbers of the Austrians prevailed, and Ziethen was obliged to retreat back to Troppau, abandoning the whole convoy with the exception of about 250 waggons, which General Krokow, who commanded the advance guard, was able to get through in safety along with the remains of those troops which had formed the foremost division of the escort.[1]

The Prussian generals deserved no blame for their ill success, for the guarding of a convoy through broken country is, of all things, the most difficult task a cavalry officer can be called upon to perform. In addition to this the numbers of the attacking party were much superior, and quite sufficient to ensure success.

The incidents we have narrated, while instructive as examples to study, are also useful as tending to convey to the reader a tolerably clear idea of the manner in which the cavalry were made use of in the wars of that age, and they all tend to show the striking contrast that existed between that service in the two contending armies.

The great successes of the Prussian monarch in these campaigns, in the face of enormous odds, gave the Prussian army an extraordinary reputation, and established Frederick as the most skilful general of the age. The reforms in drill and organisation introduced by him were naturally copied and imitated by the other European nations, until the Prussian system became the model for the whole civilised world.

This naturally had an important influence upon the cavalry, and for many years, in fact we may say almost to the present day, the cavalry systems of most armies were based in their main features upon the Prussian cavalry of Seidlitz and Ziethen. In 1749 the Count de Melfort, one of the best

[1] Carlyle, v. 241, 242, 244, 245.

French cavalry officers, visited the Prussian camps, and conferred with the Prussian cavalry generals on the tactics of that arm.[1] Marshal Saxe had also visited Frederick's court, and the interchange of ideas naturally resulted in a more cosmopolitan system of working cavalry, and soon in England, France, Hanover, and Austria the cavalry were organised, drilled, and manœuvred in action as closely as possible after the example set by the Prussian horsemen. It was left to Napoleon to perfect the method of using cavalry by employing it skilfully in every phase of its duty, for he knew how to use it in covering the movements of his army in the campaign, in making decisive charges in action, in following up successes, and in covering retreats. His cavalry, however, were never so thoroughly and perfectly trained to manœuvre at speed as were the Prussian horsemen. The constant wars and tremendous labours of Napoleon rendered it impossible for him to devote the same close personal attention to his horsemen that Frederick continually bestowed upon his.

For a time the Prussian army was imitated by other nations with ridiculous closeness, so much so as to draw upon them severe strictures by military writers. General Lloyd, who served in several of the campaigns against Frederick, writing some years afterwards, comments harshly upon the great attention paid to the numberless and insignificant trifles with which all the armies of Europe at that time abounded. He says their whole science was reduced to adjust a hat or a button. "They attribute," he writes, "the glorious victories of the King of Prussia to these and like puerilities." "Short clothes, little hats, tight breeches, high-heeled shoes, and an infinite number of useless motions in the exercises and evolutions have been introduced without any other reason than their being Prussian."[2] This extract will give an idea of the great influence the Prussian military system exercised over the armies of Europe during the latter portion of the eighteenth century.

[1] D'Aldeguier, 69. [2] Lloyd's History, Preface, p. ix.

CHAPTER XXII.

RUSSIAN CAVALRY IN THE LATTER PART OF THE EIGHTEENTH CENTURY.

PETER THE GREAT had placed the cavalry upon a very effective footing, but nevertheless various changes were subsequently made from time to time to suit the ideas of the age. In the reign of Elizabeth the cavalry were divided into squadrons, and the cuirassiers were supplied with iron breastplates, long straight swords, two pistols each, and jack-boots.[1] They were mounted on heavy German horses. Movements from the flanks by threes were also adopted about this time, and the example set by Frederick the Great in the management of his cavalry was closely imitated by the Russians, as by all other European nations.

In 1763 a commission was appointed for the special purpose of reorganising the Russian army upon the Prussian model. It was therefore arranged that there should be one heavy cavalry regiment for every two regiments of infantry, and a squadron of hussars and 100 Cossacks for every two squadrons of heavy cavalry. The cuirassiers were reduced and replaced by carbineers, who were armed with carbines without bayonets, after the custom in France under Louis XIV.[2]

From 1763 till 1775 the heavy cavalry were armed with large swords, two pistols each, and iron breastplates. The carbineers used long carbines and heavy swords. The hussars carried a sabre, a pistol, and a short carbine. The cavalry in 1786 wore leather breeches, jack-boots, spurs, and swords with brass hilts and leathern scabbards. The dragoons and carbineers had their carbines fastened to the saddles, which were of the German pattern, and were placed upon a folded rug or pad. The Hungarian saddle was used by the light cavalry. It was placed on a pad of felt made of cow-hair. All the cavalry had holsters. Each troop carried 20 axes and four spades. They still formed in three ranks.[3]

[1] Ivanoff, 52. [2] Ibid. 83. [3] Ibid. 92, 93.

About this period, in 1766, the "Instruction to a Cavalry Colonel" was issued, and in it we see a much greater attention given to the details of drilling the individual soldier. The division of the squadrons into troops and into sub-divisions was also made in 1766. Each troop was supposed to contain about seventeen files, but in reality there were often only sixty or eighty men in a squadron. In the "Instruction to a Cavalry Colonel," great attention is directed to the art of riding the horse properly, and to the thorough training of the horses. In order to improve the horsemanship, riding-masters were appointed to each regiment, who were to teach all the officers in the regiment as well as two soldiers from each division. Five soldiers were also chosen from each regiment to be trained to act as riding-masters, and no one could be appointed as an under officer or corporal, unless he was acquainted with the duties of a riding-master. It was considered that no officer was of any value who was not a thorough horseman, nor soldier of any use who could not sit firm upon his horse. This idea of the drilling of the individual horseman is a reflex of the principles adopted by Frederick the Great, which have already been referred to.[1]

Potemkin, Rumiantzoff, and Souvoroff made several improvements in the Russian cavalry in the latter part of the century. Rumiantzoff, who had fought in the Seven Years' War, and was imbued with the spirit of that age, advocated the use of the "*armes blanches*" alone. In the campaign of 1774, when he had the command, he ordered his cavalry to be formed in two ranks, between the squares of the infantry, but even with the rear of the squares, and with very small intervals. Firearms were forbidden to be used, except by order of the colonel, and upon his responsibility alone. The largest organisation of cavalry was the brigade, consisting of two regiments.

Souvoroff, who was very highly spoken of as a partisan officer in the Seven Years' War, was most impetuous in his movements. In 1768, with one regiment of infantry and two squadrons of cavalry, he marched 1,000 versts in one month, defeating his opponents wherever he met them.[2] At the taking of Turtukai he handled his cavalry very judiciously. He considered the sword as the best weapon for horsemen.

Potemkin paid careful attention to the cavalry. He valued the dragoons and light cavalry highly. He doubled the number of the dragoons, and reduced the heavy cavalry. He improved the dress and equipment, cutting the hair short, and abolishing powder. He also organised new regiments of

[1] Ivanoff, 96. [2] Ibid. 97.

chasseurs and hussars, and improved the Cossacks. He adopted the Hungarian saddle, it being light, cheap, and easy to the horse. He was anxious to secure a good seat, a skilful use of the sword, and a power of manœuvring steadily, wheeling by divisions and files.[1]

At the battle of Cagool, 21st July, 1770, the cavalry present were two regiments of cuirassiers, three of carbineers, two of hussars, and six Cossack regiments, with a provisional regiment of five squadrons.

This cavalry, by rapid and vigorous charges, under Count Soltikof and Prince Dolgoroukoff, at the close of the battle, decided the victory in favour of the Russians.

Although the use of firearms by the cavalry had been forbidden, the habit was so strong that it was impossible to prevent it in the presence of the Turkish cavalry (the Spahis), who were very numerous and efficient. At this battle of Cagool, a great portion of the carbineers being stationed between two large squares, began firing on horseback in a very irregular manner.

[1] Ivanoft, 121.

CHAPTER XXIII.

LATTER PORTION OF THE EIGHTEENTH CENTURY—REVOLUTIONARY WARS OF AMERICA AND FRANCE.

FROM the close of Frederick's wars until the outbreak of the Revolution in France, the continent of Europe was at peace, and the different governments availed themselves of the opportunity to reorganise their armies, and to adopt those improvements in tactics which Frederick had brought into notice.

We find during this period that great attention was paid to the military art, that many works were written upon tactics, and that the whole subject was thoroughly discussed in all its bearings, the illustrations and arguments being almost all drawn from the experiences of the Seven Years' War.

In France many changes were introduced, and particularly in the organisation and tactics of the cavalry. On the 1st January, 1766, the cavalry were, by ordonnance, formed upon two ranks only, and the intervals between the squadrons made equal to one quarter of the front of the squadron. For some time after this, the rear rank retained the distance of twelve paces behind the front rank. They still were taught to fire together, but they also charged sword in hand, both at the trot and at the gallop. The charges at the gallop were not very steady, on account of the want of care in the preparatory drill. This was, however, a great step in advance of the previous system in use in the French cavalry.

Another improvement in the French army, evidently the result of the example set by the Austrians in their splendid outpost service, was the organisation of a numerous and efficient body of light horse, which was much more required than ever, on account of the great increase in the size of armies, and the consequent necessity for a more extended and more active system of advanced posts.[1]

[1] Humbert, 113.

These light horsemen were well equipped for the duties for which they were organised, being armed with a carbine, a pistol, and a sabre, which last weapon they soon learned to rely upon mainly. These horsemen carried a very heavy load upon their chargers, however, in the shape of a weighty saddle, a cloak and valise, besides forage and provisions. Marshal Saxe had seen the evil of this, and had expressed himself strongly against superfluous baggage—an important point that the cavalry officer should never lose sight of.

Under Louis XVI. further improvements were made in the cavalry service: the rear rank was closed up to within two paces of the front rank, and the movement by groups of three files, which had followed the introduction of the manœuvre copied from the Germans, called *Wiederzurück*, by which changes of front were made to the rear, was abolished, and the movement by sections of four files was adopted. This is now the general system in all civilised countries for the movement of small bodies of cavalry to a flank.[1] Schools of horsemanship were also established, and greater care taken in the individual training of the horsemen.

On the outbreak of the Revolution the French cavalry consisted of 30 regiments of heavy cavalry, containing 12,960 men; 17 regiments of dragoons, containing 6,528 men; 4 regiments of hussars, containing 1,280 men; and 3,414 cavalry of the guard, making in all over 24,000 horsemen.[2]

The Prussian cavalry retrograded in the last years of Frederick's reign. The best officers had grown old or had died, and the army was filled with new soldiers. Although the principle upon which it was organised was good, and the traditions of the service of the highest type, yet it had fallen off immensely during the years that elapsed after Frederick's death, so that on the outbreak of the revolutionary wars it did not produce the striking results that might have been expected of it. The falling off seems to have been more in the generals than in the cavalry itself, for in the early campaigns of this war the Prussian cavalry in small bodies proved themselves more than a match for the French horsemen, but there did not appear any general who could use them in great masses on the battle-field, as they were constantly used by Frederick.

The Austrians had modelled their cavalry as much as possible after the Prussian system, and in the last campaigns in Bohemia and Turkey, under the celebrated General

[1] Humbert, 118. [2] Carrion Nisas, ii. 389, 390

Loudon, the force had acquired a high *morale*. In the year 1792 the Austrian cavalry was very numerous, and comprised 12 squadrons of carbineers, 54 squadrons of cuirassiers, 42 squadrons of dragoons, 36 squadrons of light horse, 74 squadrons of hussars, and 8 squadrons of uhlans; in all, 226 squadrons, containing 44,000 men.[1]

The revolution in America of the thirteen colonies against Great Britain broke out in 1776, and the war lasted for seven years, until, in 1783, peace was made by the acknowledgment of the independence of the United States. This was effected mainly through the assistance given by the French Government to the Americans, whom they aided with troops, ships, arms, and money. The war, however, fought as it was in a country almost covered with forests and wildernesses, did not give any facilities for the use of cavalry, nor do we find that force exercising any great influence upon the fate of the war. A few partisan corps were organised on both sides, and did good service, but it was upon a small scale, and the records do not convey any practical instruction to the cavalry officer. The broken and intersected character of the country had the effect of producing a system of fighting from under cover with long-ranged rifles of great precision of aim. These rifles were used very much by the American troops, who, being undisciplined, were only fitted for that desultory and irregular kind of fighting. This war had the effect of introducing special bodies of riflemen into European armies. These corps for a long period were maintained for the purpose of skirmishing. All infantry troops are now armed, however, with this same type of weapon.

The Revolution in France, which followed closely that in America, had a great effect on military affairs, not only in the system of tactics, but also in the method of recruiting and organising armies. When the people dethroned the monarch, and took possession of the government of the country, it was a terrible shock to the prejudices and sentiments of the whole of Europe, which for so many centuries without intermission had been governed in almost every part upon the monarchical principle. The result was a combination of almost all the kingdoms of Europe in aid of the French monarchy, and to check the growth of a spirit of democracy, the spread of which was much to be dreaded.

This combination of so many countries against the people of France naturally led to extraordinary steps being taken by the rulers of the new republic to meet successfully the threatened attacks. They therefore decided to compel the

[1] Jomini, Grand Operations, v. 17.

population to fight in defence of the country, and in March, 1793, decreed a conscription of 300,000 men in addition to those already under arms. As the exigencies of the war increased, a larger force was required, and in the following July a further levy was made of 1,200,000 men. These immense numbers were drafted into the old regiments, in order that they might be readily drilled; but for a time the discipline was very imperfect, and the troops unable to manœuvre with any steadiness.

These great masses, so much more numerous than the armies of preceding ages, required a different organisation to insure a rapid execution of orders and a proper system of responsibility. This led to the formation of the troops into divisions and *corps d'armée*, composed of all three arms of the service. The brigades were commanded by generals of brigade, the divisions by generals of division, and the *corps d'armée* by general officers, with a commander-in-chief over all.[1] By this means these large numbers were more easily handled and manœuvred. Three battalions of infantry made a demi-brigade, six battalions made a brigade, two brigades a division, and two or more divisions a *corps d'armée*. To each division was usually attached two regiments of light cavalry, dragoons or heavy cavalry, a battery of field artillery, and one of horse artillery.[2]

The cavalry of the French army in 1793, while numerous, were still weak in proportion to the strength of the whole army. They consisted of two regiments of carbineers, sixteen regiments of heavy cavalry, who fought only with the straight sword and pistol, twenty regiments of dragoons, twenty-five regiments of *chasseurs à cheval*, and twelve regiments of hussars. These hussars were armed with the carbine, curved sabre, and pistol, and were organised like the dragoons. There were about 22,000 chasseurs, and 11,000 hussars, or in all 33,000 light cavalry. The hussars were seldom expected to charge, and only in cases of emergency, while the chasseurs were used in the charge constantly, and also continually as light troops for outpost service, so that they were really the most useful of all the cavalry. These regiments were usually composed of four squadrons of about 200 men each.[3]

This system of dividing up the cavalry among the divisions was soon found to be faulty, as in small bodies they were unable to perform any important service. General Hoche was the first to see the weakness of the system, and

[1] Carrion, ii. 412, 413, 414. [2] Rocquancourt, ii. 191.
[3] Carrion Nisas, ii. 414, 415.

upon his appointment to the command of the army of the Sambre and Meuse, in 1797, he united the hussars, dragoons, and chasseurs together in separate divisions,[1] a measure which was a great improvement upon the preceding arrangements.

Napoleon, in Italy, found the same evil in his army, but did not organise special divisions; he secured the same result by detaching from the infantry divisions the regiments of cavalry, and brigading them with the cavalry of the reserve.

The great numbers of the Revolutionary armies had another very important influence upon the system of tactics employed in action. Frederick the Great's army was small, compact, and drilled to the highest perfection. He could execute flank marches under the eyes of his enemy with the steadiness and order of a parade movement. He could deploy his troops, or change his front under fire of artillery, as we have seen he did at the battle of Sohr. He could re-form his line with perfect regularity after a night surprise and defeat, as at Hochkirch. He had, in fact, a highly-trained implement, with which he could do anything. This affected his tactics materially. His men fired rapidly with great precision, and to avail himself of this superiority he fought them in lines, and their manœuvring capacity was so great that, instead of the direct attack, he almost always used the oblique order, and marched his army against one or other flank of the enemy.

The French generals of the Revolution had immense numbers of enthusiastic soldiers under them, filled with zeal and love of glory, but poorly drilled, both in the musketry exercise and in field manœuvres. For years before the war broke out the military writers had been discussing the great question of the comparative merits of the column formation and that in line, as the method of attack for infantry. Folard had written voluminously in favour of the column, and he had been followed by Menil-Durand and others, and a large school held the view, that the direct attack in heavy columns was the correct system for infantry to adopt.

Circumstances rendered this kind of formation the only one open to the French. Their undisciplined masses of enthusiastic recruits could not manœuvre with sufficient steadiness to compete with the regular forces of Prussia and Austria. They therefore adopted the system of attacking directly the positions of the enemy in great columns, covered by large masses of artillery, which gave them the support

[1] Rocquancourt, ii. 195.

they required. To aid in these attacks and to pave the way for them, the French adopted the custom of throwing forward clouds of skirmishers, or tirailleurs, composed of the best marksmen, who, like the velites of the Roman legions, commenced the action by a heavy fire upon the enemy, to cover the advance of the massive columns, which, following in their rear, were a sort of revival of the ancient phalanx.

These skirmishers did not require a high amount of tactical skill to perform the services demanded of them, and gave an opportunity of using to the best advantage a class of men who would otherwise have been unable to render effective aid. The heavy columns which marched to the attack under this cover were composed of raw troops, who gained confidence and courage from the weight of numbers; for it requires high training and experience to enable troops to fight boldly in line. It is the natural instinct of men to crowd together in masses under visible danger, and the French system followed that instinct in the deep masses in which their infantry attacked. They were called columns, and were columns originally, but in action they often became nothing but heaps of men crowded together in disorder.

This system among the infantry naturally led to a more extensive use of artillery; horse artillery being also employed in large force in connection with the cavalry. Napoleon augmented that arm very materially, and attached batteries to every division of cavalry.

The cavalry were armed with the straight sword and pistol; the dragoons with fusils, pistols, and swords; the chasseurs with carbines, pistols, and curved sabres; the hussars with pistols and sabres. They were used for outposts, patrols, and reconnoitring parties. In the early actions of the Republic the cavalry did not make charges upon the battle-field, but were used more in partial combats, where their individual address and enthusiasm had a considerable influence upon the result. The heavy cavalry did not exercise much influence in battle until Napoleon came upon the scene.

One of the most extraordinary and striking incidents in the history of the cavalry service occurred in the campaign in Holland in the month of January, 1795. The moats and canals in that country caused it to be so intersected in the summer that cavalry could hardly operate in it at all, but in the winter of that year all the ditches and watercourses were frozen, and gave a free passage to horsemen and horse artillery over the ice. The arsenal of Dordrecht was taken in this way, the troops crossing the frozen Lake Biesbos to attack it; while, at the same time, the French general, hearing that a

portion of the Dutch fleet was frozen up in the neighbourhood of the Texel, and fearing that it might get clear and set sail for England, despatched a large force of cavalry and flying artillery against it. They moved rapidly through North Holland, crossed the Zuyderzee on the ice, and the strange spectacle was presented of cavaliers and light artillery investing ships of war and summoning them to surrender.

The commanders of the vessels, confounded at the idea of being charged by cavalry, a species of attack they had never anticipated, surrendered without resistance, and to the French hussars belongs the credit of having been the only cavalry that ever captured a fleet of war vessels on the sea.[1]

The Prussian cavalry, during the first wars of the Revolution, did not obtain any striking successes in winning victories, but in combats and isolated instances did good service. One of the most successful affairs in the first campaign was the defeat, on the 17th of September, 1792, of General Chazot, who, at the head of some 10,000 men, composed the rear-guard of Dumouriez's army. He was charged vigorously by 1,500 Prussian hussars, accompanied by four pieces of horse artillery. His troops were at once routed, and fled in wild confusion back upon the main army, and through it far upon the road to Paris.[2] The whole French army was nearly defeated by this single charge of a small force of cavalry—a clear illustration of the moral effect of a charge of horsemen upon raw levies of infantry.

The Austrians, in November, 1793, defeated a column 10,000 strong, which attempted to raise the siege of Quesnoy. In this action a French square of 3,000 men was broken and totally destroyed by the Imperial cavalry.[3]

In all the wars of the latter part of the last century the cavalry of the Austrians and Prussians was much better than that of the French, and although no great victories were won by the charge of large masses of horsemen, as so often happened under Frederick the Great, yet in all their operations the cavalry of the allies proved themselves to be bold and efficient soldiers. At Villiers-en-Couchée about eighty-six Austrians and two hundred English light dragoons attacked a force of about 10,000 French infantry and cavalry. The charge was so vigorous and successful that the French horsemen were driven back upon the infantry, and the infantry also routed, the whole body being driven in confusion to Cambray, with the loss of 1,200 killed and wounded, and three pieces of cannon. This was a most astounding success

[1] Rocquancourt, ii. 233, 234; Alison, i. 343, 344. [2] Alison, i. 188.
[3] Ibid. 278.

to be gained by 300 horsemen.[1] The Emperor of Austria gave the order of merit to all the officers, and the English regiment of the 15th Hussars carries to-day the name, "*Villers-en-Couchée*" as one of its badges.

At Handschusheim, in 1795, the Austrian cavalry mainly contributed to the defeat of the French, while in the attack upon the lines of Mayence the Austrian horsemen again covered themselves with glory. A few squadrons of cavalry were attached to each of the three columns of attack, and a large reserve of cavalry was held in hand to follow up any success. The infantry soon effected a lodgment, and the horsemen closely following, rode in and achieved a complete victory with but little loss.[2]

At Wurzburg, in 1796, the Austrian cavalry also contributed mainly to the victory, and it seems to have been the first general action in the Revolutionary wars in which the cavalry were employed in large bodies, and exercised an important influence on the general result. The Austrians won the victory through the skilful use of the reserves which were thrown in successively until the fate of the action was decided.[3]

In the campaigns of 1796, 1797, in Italy, the cavalry did but slight service. After the battle of Roveredo, Napoleon sent his aide-de-camp Lamarois, with only fifty dragoons, to ride through the fugitives into the defile of Calliano, by which means large bodies of infantry were cut off and captured.

The upheaval of the Revolution, and the daring ambition of Napoleon, led among other remarkable events to the French invasion of Egypt, and to a series of battles between the enthusiastic soldiery of France and the dashing horsemen of the East. These actions are of intense interest to the cavalry officer, as they were most peculiar in their character, the army on one side being composed almost entirely of irregular light horsemen of wonderful skill in the individual use of the horse and the sword, but without any regular discipline or capacity for manœuvring.

The Mamelukes of Egypt were the actual rulers of the country, and were composed of Circassians, Albanians, Servians, and Bosnians, who, torn from their parents in infancy, were sent into Egypt to occupy that province. They were soldiers by profession, never engaged in anything else, and prided themselves solely upon their horses, their arms, the splendour of their accoutrements, and their individual military prowess.[4]

[1] Beamish, 288. [2] Nolan, 45.
[3] Archduke Charles, Principes de la Stratégie. Chap. x. [4] Alison i. 506.

This force consisted of 12,000 horsemen, and was commanded by twenty-four beys, who each maintained and equipped about 500 or 600 Mamelukes. Each soldier was followed by two attendants, somewhat upon the principle of the *lance fournie* of the middle ages, or the *Trimacresie* among the Gauls. They formed altogether a magnificent body of horsemen, but were very deficient in discipline, and steady manœuvring at speed was unknown to them.

Their servants do not appear to have been intended to take any part in fighting in the field. One servant carried the baggage and provisions upon a horse, the other carried a carbine. The Mamelukes were armed with a pair of pistols and a poignard in the girdle, another pair of pistols upon the saddle, a sabre, and a blunderbuss. They were clothed in shawls and turbans with voluminous folds, almost serving the purpose of armour, although according to Napoleon they wore coats of mail and casques. They trusted more to their dexterity in the management of their chargers to evade a sabre stroke, than to parrying with their finely-tempered light blades, which would not stand a severe blow.

Napoleon gives some interesting particulars in reference to the Mamelukes in his memoirs. He says that "two Mamelukes would hold their own against three French, because they were better armed, better mounted, better drilled. They had two pairs of pistols, a blunderbuss, a carbine, a helmet with visor, a coat of mail, and many horses and servants on foot to aid them. But 100 French cavalry would not fear 100 Mamelukes, 300 would conquer a like number, and 1,000 would beat 1,500, so great is the influence of tactics, order, and manœuvres."[1]

The French cavalry generals, when they had become acquainted with the system of fighting of the Mamelukes, were accustomed to meet them in many lines. When the first line moved up the Mamelukes would attempt to outflank them; the next line would thereupon advance to the right and left to the succour of the first, the Mamelukes would then wheel out again to outflank the second line; at this moment the French generals usually gave the order to charge, and always broke them and drove them off. The early actions, however, were all won by the infantry and artillery.

The horse appointments of the Mamelukes were very massive and highly ornamented. The bits were so large and powerful that the most fiery steeds were readily checked in full career. The stirrups were short, and the saddle had the pommel and cantle so high, that the horseman could hardly

[1] Liskenne, iv. 355.

be unseated even if wounded. As they carried no baggage whatever, the horse was not overloaded, although the trappings were heavy.

Such was the force the French army had to encounter in Egypt. Napoleon had but few cavalry, and they quite incapable of coping individually with the Eastern horsemen, so that he was obliged to rely altogether upon his infantry and artillery. The first skirmish took place at Ramanieh upon the Nile. Desaix, who was attacked, commanded the second division, and formed his troops in squares, with artillery at the angles, and the baggage in the centre, and succeeded in dispersing his assailants by one discharge of grapeshot.

Napoleon's dispositions for fighting the Mamelukes were peculiar, and yet admirably fitted for the enemy he had to encounter. He formed his army into five divisions. Each composed one square, six deep, with the artillery at the angles, and companies of grenadiers in platoons kept in readiness to support menaced points. The cavalry, then only 200 in number, were placed in the centre of the square. The troops marched in this formation, the front of the square marching in line, the rear the same way, the two side faces marching in column. When attacked, the whole halted, faced outward, and steadily and firmly awaited the charge. When the French were to advance to the attack, the three front or outside ranks formed column and charged, while the square remained in the same formation but only three deep, and constituted the reserve.

The five divisions so organised, moved on towards Cairo, continually watched and surrounded by the Mamelukes, who were ever ready to take advantage of any carelessness. The first great battle took place at the Pyramids, or more properly at the village of Embabeh, near Cairo, where Mourad Bey, with about 8,000 superb horsemen, and a large body of ill-trained infantry, had prepared to deliver battle to secure the safety of the capital city. An entrenchment with some forty pieces of artillery had been constructed near the bank of the river, the cavalry, with their right resting upon it, spread out to the left upon the wide sandy plain that stretched across to the Pyramids. Napoleon, seeing that the cannon were stationary, and not upon carriages, and could not be aimed in any but one direction, decided to move to the right so as to avoid their fire. Mourad Bey, who saw the manœuvre, and understood the effect of it, with the rapidity and decision of a skilful general, resolved to charge the French columns at the moment they were effecting their flank march.

The charge was made by about 7,000 horsemen, in a great confused swarm. Desaix had hardly time to complete his formation before some of the foremost riders were upon him. His men were consequently somewhat broken, and thirty or forty of the bravest Mamelukes penetrated the ranks, and were killed in the midst of the French square. The other divisions were all formed ready awaiting the charge. It was an imposing sight for the French soldiers to encounter. The immense hordes of magnificent horsemen, brilliantly equipped, and mounted upon the swiftest horses, came down upon them at full gallop, the glitter of their arms, and accoutrements fitfully flashing from the rolling clouds of dust, that marked, yet partially screened their advance. The loud shouts which rent the air, and the thundering noise of the numberless hoofs that beat the ground, painfully impressed the French infantry, who, though not panic-struck, yet most anxiously awaited the result. Soon the artillery began to pour in rounds of grape-shot, and then the musketry fire went pealing along the front of each massive square. Volley after volley poured out rapidly from the successive ranks, and at each discharge horses and riders in hundreds, struck by the pitiless tempest of bullets, rolled in the sand, shaking the advance of the survivors, and causing them to swerve from the fronts of the squares.

With matchless bravery, however, they penetrated the intervals between the French divisions, and riding around with daring recklessness, attacked every face at once. Unable to break the solid and steady formation of the French infantry, they wheeled their horses round, and reined them back upon the bayonets, hoping in that way to force an entrance into the firm masses of the foot-soldiery. They fired their pistols and carbines at the distance of a few feet, and furious at their ill-success, hurled the weapons at the heads of their foe. After a desperate struggle in which those who had lost their steeds, creeping along the ground, cut at the legs of the front ranks with their cimeters, the Mamelukes, thoroughly beaten, fled in confusion, leaving a rampart of dead men and horses around the squares, terrible proofs of the pertinacity and bravery with which they had fought. The losses of the Mamelukes were very heavy, while the French loss was only about 200.[1]

This action settled the question decidedly as to the capacity of the French infantry to withstand the Egyptian horsemen, and forms a good illustration of the necessity of thorough discipline in the cavalry service, as well as indi-

[1] Alison, i. 509, 510; Duc de Rovigo's Mémoires, i. 56, 57.

vidual skill in the use of arms. Had the Mamelukes been well drilled to charge in order in large masses, and been properly supported by a sufficient force of horse artillery, who can doubt that they would have swept the French infantry like chaff before them? As it was, with their imperfect tactics, and their total want of artillery, they were very nearly successful, a very few batteries of horse artillery would have caused frightful losses in the massive formation the French were obliged to adopt, and if they had deployed to avoid the artillery fire, they would have been exposed to the charge of the horsemen.

In the combat of Sediman, shortly after the battle of the Pyramids, during General Desaix's expedition into Upper Egypt, an incident occurred which serves to prove that it is the fire of an infantry square that alone can save it against good cavalry, and not the bayonets. In this action Desaix's division was formed in one large and two small squares, on the approach of a large body of Mamelukes, who were seen coming to the attack. The commandant of the smaller square on the right, rendered over confident, probably by the result of the battle of the Pyramids, ordered his men to withhold their fire until the horsemen were within point-blank range.[1] This they did, and poured in a volley at very close quarters. It was too late, however. The rush of the galloping horses was too vehement to be checked suddenly, and the square was broken and a number of the men killed; the wounded horses and men not falling until they had traversed the square, and then they fell, scattering at various distances, pierced with the bullets they had received just at the instant before the shock. General Desaix reprimanded the commandant very severely for his fault, which had nearly caused the defeat of his whole force.[2]

During the siege of St. Jean d'Acre in the following year, Napoleon heard of the approach of a large Turkish army which was advancing to attack the French, and raise the siege of the town. This force, which consisted of the remains of the Mamelukes, the Janissaries of Damascus and Aleppo, and an innumerable horde of irregular cavalry, alarmed Napoleon, and obliged him to take steps to defeat it. Kleber was sent from Acre to join Junot, who was occupying an advanced post at Nazareth. On his march he encountered a body of 4,000 horse, which he defeated by the same system of tactics and the same rolling fire that had been so successful in Egypt. On the 16th April, 1799, Kleber advancing to attack the Turkish camp near Mount Tabor, met the whole

[1] Humbert, 155. [2] Mémoires, Duc de Rovigo, i. 70.

Turkish army moving up against him. He at once drew up his small force in squares with the artillery at the angles. He had barely completed his arrangements when the whole mass of the enemy's forces, consisting of 15,000 cavalry and as many infantry, came thundering down upon his little army, as if to sweep the handful from the field by one impetuous charge. The steady and confident French veterans never wavered an instant, the musketry and artillery fire was at once opened, and the steady aim and the continuous tempest of well-directed bullets soon made great gaps in the enemy's masses, and soon erected a rampart of dead men and horses in front of the squares, behind which the French infantry gallantly maintained the unequal combat for over six hours.[1]

Napoleon, who had marched to Kleber's assistance with a large reinforcement, then arrived upon the heights which overlooked the field, and detected Kleber's position in the midst of the turbulent swarm of Orientals, by the regular and incessant volleys which flashed out from the French squares and marked their presence from afar. Napoleon's resolutions were promptly taken. A detachment of cavalry and light artillery was despatched under General Lecourbe, against the Mamelukes who were in reserve, while Napoleon himself, with Bon's division in two squares, advanced to attack, in flank and rear, the Turks who were engaged with Kleber. The immense superiority of the discipline and tactics of the French troops soon gave them the victory, and the Turks with heavy losses were driven from the field.

This extraordinary victory over 30,000 enemies, half of whom were cavalry, was accomplished by only 6,000 French veterans.

The last great battle which took place in Egypt between the French and the Mamelukes was fought at Heliopolis, on the 20th March, 1800, and resulted, like all the other actions between them, in a glorious victory for the former.

Kleber, who had concentrated his army from all parts of Egypt, had only 12,000 men whom he formed up in four squares, with artillery at the angles, and the cavalry in the intervals between the squares. Companies of grenadiers were made use of to double the corners, and were ready for offensive movements in case of need. An attack was made upon the camp of the Janissaries in the village of Matarieh, which was advanced far in front of the remainder of the Turkish army, and it was soon captured, and large numbers of its defenders killed.

The Turkish main army then advanced to attack the

[1] Alison, i. 522.

French, who formed a line of squares with the artillery in the intervals, and the cavalry in rear of the centre, ready to charge through at the critical moment. The disposition of Kleber's army was very well conceived, and proved most advantageous in the action. The battle commenced with the fire of artillery, which was much more effective on the part of the French than on that of their opponents. The cannonading so galled the Turks that they prepared for a general charge. The concentration of their masses warned the French of the coming onslaught; 20,000 horsemen at full speed, shaking the ground with their thundering tramp, was enough to try the stoutest heart. The French stood firm, however, while the artillery poured volley after volley of grapeshot with hurried vigour into the advancing masses. The front rank were nearly all swept away by the storm of missiles which filled the air, and the rear ranks, dismayed at the carnage, wheeled about and fled, before a single musket-shot had been fired.[1]

The Grand Vizier rallied his troops and attacked again, but it was impossible to withstand the tempestuous volleys of the French squares, which dealt death and destruction far and wide through the immense swarms which surrounded them. In a short time the whole Ottoman host fled in utter rout, leaving Kleber complete master of the field, and of their camp.

In these campaigns the French adopted the system of forming their infantry skirmishers in little squares or groups, of four men in each, in order to resist attacks of Bedouins or Mamelukes. Bonaparte also had provided his infantry with pikes, ironed at both ends, which were intended to be placed in the ground in front of the soldier as a defence against the charge of cavalry, or to be used as a protection around the circuit of the camp. The great heat of the climate was so oppressive to the French troops, that Napoleon was afraid to overburden his men by compelling them to carry this extra weight, and the pikes were consequently never used. It will be remembered that this was the same device that was used by the English archers at Agincourt against the charges of the French men-at-arms.

Another interesting and peculiar incident of this expedition was the organisation by Napoleon of a regiment mounted on dromedaries, which constituted a species of dragoon force very efficient upon the desert, where horses marched with great difficulty.[2] The corps was composed of carefully-chosen infantry soldiers, armed with muskets and

[1] Alison, ii. 165. [2] Humbert, 165.

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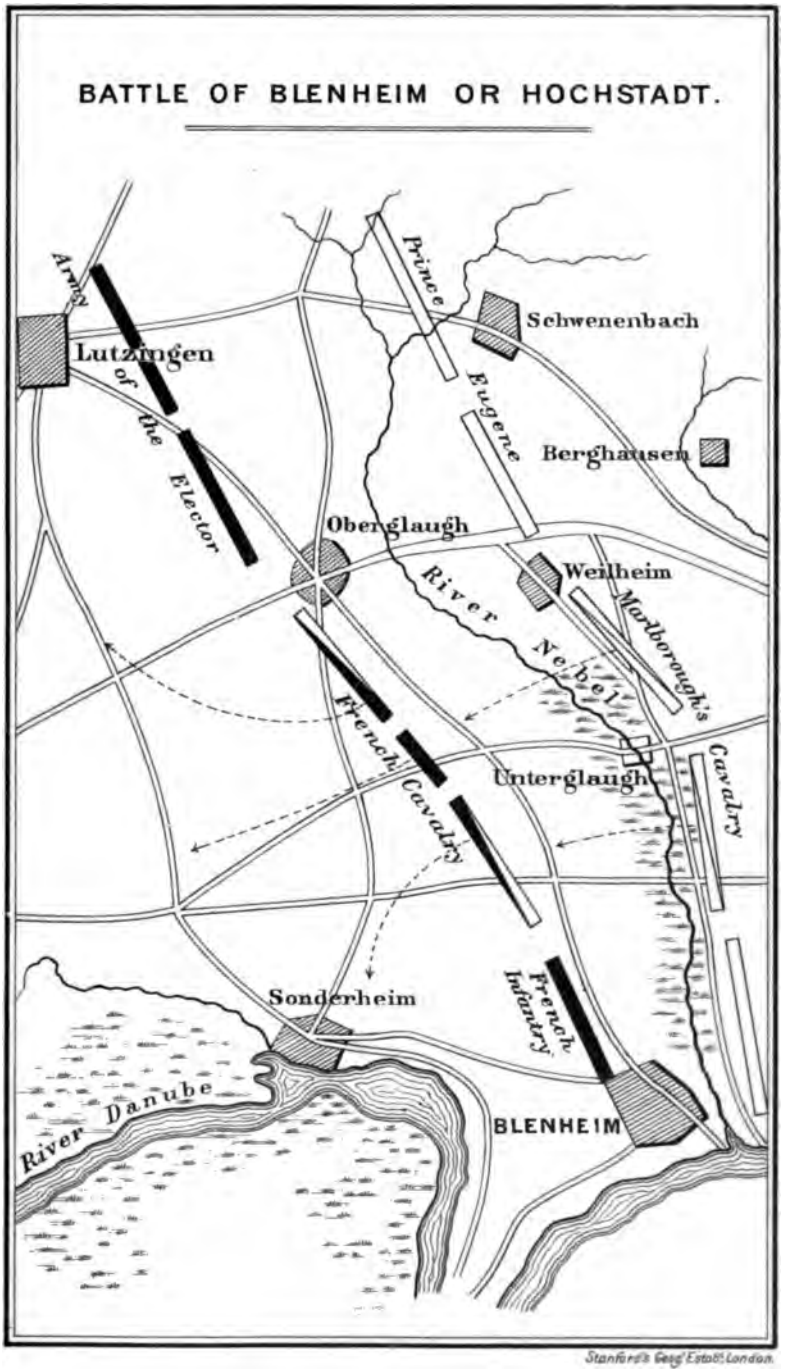

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bayonets, and riding upon a kind of Turkish saddle, which covered the hump of the animal. They were able to carry ten days' provisions with them. On going into action they halted, and the dromedary knelt down motionless, while the riders dismounted, formed up as infantry, and fought either in line or in square, as occasion required. At first each animal carried two soldiers, but it was found better to have only one, the place of the other being used to carry provisions.

CHAPTER XXIV.

CAVALRY UNDER NAPOLEON.

NAPOLEON had a very high opinion of the cavalry service. and understood thoroughly all the various phases of its duty No man knew better the importance of good light cavalry for the purpose of covering the movements of an army, and for searching out and watching the marches and designs of the enemy.

He was equally impressed with the value of cavalry used in large masses, to make great attacks upon the battlefield, and he knew how to turn the scale of victory by pouring torrents of well-drilled horsemen upon a whole wing of an opposing army, to sweep it from the field by the mere force of numbers and impetuosity.

He soon changed the system of organisation in the French army, and gathering together the scattered regiments of horse, he formed them into brigades and divisions composed of troops of the same type. He was so impressed with the importance of using the heavy cavalry in large masses, that he went so far as to combine the divisions into *corps d'armée.* In 1805, the cavalry *corps d'armée* of Murat reached the enormous number of 22,000 men, composed of cuirassiers and dragoons, with 1,000 horse artillery. In the campaign in Russia, in 1812, on crossing the Niemen, there were in Napoleon's army, in addition to the divisions of light cavalry attached to each *corps d'armée* of infantry, four *corps de reserve* of cavalry under Murat, commanded by Nansouty, Montbrun, Grouchy, and Latour Maubourg, which contained in the aggregate 38,200 men in 208 squadrons.[1]

Shortly after Napoleon's accession to the imperial throne, he established a great camp at Boulogne, where his army was carefully exercised in manœuvring in large masses. The system of tactics in the cavalry was based upon the ideas of Frederick the Great, nor did Napoleon make any improve-

[1] Boutourlin, Campaign of 1812

ments in their manœuvres. He was himself an artillery officer, and but little acquainted with the minutiæ of cavalry drill. Frederick, on the contrary, was thoroughly well versed in all the details of the tactical manœuvres of all three arms, and the result was a perfection of training among the individual horsemen in his army such as was unknown among the troops of Napoleon.

Napoleon, however, well knew the value of the cavalry service in every sphere of its duty. He fully appreciated the use of light cavalry for outpost and reconnoitring purposes, and was far superior to Frederick the Great in that most important quality of the general-in-chief—the capacity to discover the position, the designs, and the movements of the enemy. Frederick, as we have seen, was continually incurring risks and defeat through his inability to discover the plans of his opponents. Napoleon, on the contrary, was almost always well informed. He only failed in this particular after the disastrous campaign in Russia, where his whole cavalry force was left either buried in the snows, or captured in the long and terrible retreat. The inefficiency of his cavalry before Lutzen in 1813, both in experience and numbers, left him in ignorance of the proximity of the allies, and caused him to be surprised into a general action, almost the only instance in his history of his being taken unawares.

Napoleon, feeling that his cavalry had not the manœuvring capacity that rendered so effective the Prussian horsemen of Frederick, endeavoured to secure the same results by overpowering numbers, who, rendered confident by the feeling of strength which such superiority would give them, would be able to make successful charges at the trot, at which pace alone they could preserve order in movements *en masse*.

This slower pace made the losses by the fire of opposing infantry so much heavier, that Napoleon took steps to protect his cavalry as much as possible from this danger. He consequently reintroduced cuirasses, and supplied a number of the regiments of the heavy cavalry with them, as well as with casques, or helmets, to protect the head. The carabineer regiments were afterwards also provided with these portions of defensive armour.

The cuirassiers soon acquired a very high reputation, and on many a field of action performed feats which shed a lustre upon the cavalry service, and had a great influence upon the result of the campaigns.

Napoleon had many different types of cavalry in his army. After the combat of Borghetto, in 1796, he organised a corps of Guides, whose principal duty was to watch over his

personal safety.[1] They were all veterans who had served for ten years, and were chosen with great care. This corps formed the origin and nucleus of the Consular Guard, which afterwards was increased, and became almost an army, under the name of the Imperial Guard.

There were two regiments of carabineers in the French army. In 1791 their armament consisted of a carbine with bayonet, pistol, and a straight sword. In 1794 at Landau, the carabineers, having encountered some battalions of *tirailleurs*, without arms, gave to them their carbines and bayonets. Afterwards in Austria they captured a store of English arms in a chateau, and provided themselves once more with *mousquetons*, which they had still at the battle of Austerlitz.[2] In the wars of 1809, and until they were changed to cuirassiers, they had the small musket without the bayonet.

The cuirassiers were originally organised in December, 1802, when three regiments were formed, from the fifth, sixth, and seventh regiments of cavalry. These cuirassiers were found so effective, that in 1804 nine more regiments were provided with the cuirass, and the casque was given to all the cuirassier regiments in place of the shako.[3] The two carabineer regiments being also changed, made the total force of cuirassiers in 1812 amount to fourteen regiments.

The dragoons formed an important portion of Napoleon's cavalry. In 1802 he had twenty-one regiments dressed in green uniform, faced with other colours, and with the casque as the head-covering. They were foot-soldiers on horseback, but soon became real cavalry, although with a greater capacity to fight dismounted than any of the other horsemen. The dragoons, who in the campaigns on the Rhine had not succeeded well, were sent into Spain when the war commenced in that country, and under Soult, Suchet, and St. Cyr, they soon acquired a very high reputation. The guerrilla warfare which soon broke out in the Peninsula, rendered the dragoons the most efficient type of soldier that could be employed. In 1812 Napoleon had increased his dragoons till they amounted to thirty regiments.[4]

In 1807 Napoleon formed a regiment of Polish Lancers at Varsovie, consisting of about 1,000 men, which was attached to the Imperial Guard under the name of *chevau-legers lanciers*. They were armed with a lance, with a pennon, a hussar sabre, and a pair of pistols. In 1810, a second regiment of light-horse lancers was organised, and called

[1] Humbert, 126.
[2] Ambert, 131.
[3] Ibid. 146.
[4] General Foy, i. 112; Ambert, 156.

the red lancers, from their scarlet uniforms. In July, 1812, a third regiment of the same type was created. It was composed of Poles, and contained five squadrons. These three regiments all formed part of the Imperial Guard.[1]

A decree of the 25th November, 1811, ordered a regiment of light-horse lancers to be attached to each division of cuirassiers. The first regiment, which appeared in 1812, was armed with carbines, carried on the left side, the second with the *mousqueton*, and both had bayonets. Nine regiments of the dragoons were converted into lancers in 1811.

Napoleon, in his wars in Germany, had been met by the Uhlans and Cossacks of Austria and Russia, and soon perceived the necessity of having a force of the same kind to oppose them. The lancers, organised for this purpose, did good service on many occasions.

Another species of cavalry was that known as the *chasseurs-à-cheval*, which formed a large portion of the French cavalry. In 1799 there were twenty-five regiments, in 1804 there were twenty-four regiments, and in 1812 and 1813 thirty-one.[2] They were armed with sabres, pistols, and *mousquetons*.

When Napoleon ascended the throne there were ten regiments of hussars in the army. In 1812 and 1813 they were increased to thirteen regiments. This force has been described already on a previous page, and was commonly used in most European armies.

Napoleon established a number of cavalry schools in which officers and instructors for the force were trained with great care.

Having described the composition and force of the horsemen in the army of the great Napoleon, it will be in place now to consider the manner in which that extraordinary general employed it in his wars, and the result of its exertions on the more important battle-fields.

Napoleon knew, as we have said, the importance of the cavalry in preparing the way for a battle, in covering the movements of the infantry and artillery, while concentrating and taking up their position for action, and in aiding them during the progress of the fight, by charges in support of attacks, or against advancing columns of the enemy. He also knew when to launch them against a shaken and defeated foe, in order to follow up a success and prevent them rallying.

Napoleon maintained a close relationship between the different arms. His first line was usually drawn up deployed in battle array. The second line was formed in squares of battalions, the heavy cavalry being in reserve, the artillery

[1] Ambert, 171, 172 [2] Ibid. 184, 187.

and light-horse being in front and upon the flanks. If a charge of horse broke the front line, it passed disordered through the intervals of the squares, from whose front and flanks it received a heavy fire, and then while blown and dispersed, the cavalry of the reserve fell upon it, and never failed to send the disordered mass back in confusion, to run the gauntlet of the fire of the squares a second time.

In the wars of the Empire, the principle of the necessity of the mutual support of all three arms to one another came to be thoroughly understood, and Napoleon always supported his attacks of infantry and cavalry with artillery, and always had his cavalry and infantry ready to support and aid each other.

While impressed with this idea, however, he did not overdo it, by scattering and mixing the arms together, as was done in the generations preceding him. He often massed large quantities of artillery, in immense batteries, to create a great effect upon the enemy, as for instance at Wagram, where he concentrated a tremendous force of field artillery, which by its weight of fire crushed the centre of the Austrian line, and paved the way for Macdonald's celebrated attack. His cavalry also, as we have said, although partly divided to support the different corps of infantry, was still retained in mass in sufficient force to enable sweeping charges to be made upon decisive points of a battle-field, as for instance at Eylau.

Napoleon kept his cavalry well up to the front on the day of battle, and they often suffered heavy loss by artillery fire, from the impossibility of keeping them out of range of missiles.

An account of a few of the more remarkable instances of the use of cavalry in the wars of Napoleon will illustrate in the best way the system of tactics and fighting in use among the horsemen of that time.

At the battle of Castiglione, the Austrians, attempting to extend their wing too far, thereby weakened their centre, a fault not to be committed with impunity under the eagle eye of Napoleon. The French general at once massed a formidable column of infantry for a heavy attack, and supported it with his cavalry. This desperate charge soon pierced the weakened line, and the Austrian army was cut asunder. One part retreated across the Mincio, while the other, attempting to rejoin Quasdanovitch, was closely pursued by the dragoons under Junot. It was checked at Salo by a French detachment which had occupied the place, and being pressed in

rear by the pursuing cavalry, the force disbanded with a loss of 3,000 prisoners and 20 cannon.

From this time Napoleon always, whenever possible, used his horsemen vigorously in following up a beaten and flying foe.

We have already referred to the operations in Egypt in 1798, 1799, and 1800, and the next battle in which the cavalry played an important part was that of Marengo, where a single charge of French horsemen turned a defeat into a glorious victory in less than ten minutes, and thereby settled the fate of a whole campaign.

Napoleon, by his celebrated passage of the Alps, had thrown himself upon the communications of the Austrian general, who was thus obliged to fight an action upon the result of which the safety of his army depended. Melas, who commanded the Austrian forces, had for some days after the battle of Montebello remained with his army in Alessandria, a very strongly fortified town. This somewhat deceived Napoleon, who feared his escaping by some detour around one of the flanks of his army. The French divisions were consequently dispersed at considerable intervals, when Melas, debouching from Alessandria early in the morning of the 14th June, 1800, fell upon the advanced portion of Napoleon's army, under Victor and Gardanne.

The immensely superior force of the Austrians enabled them, after a desperate struggle, to force back the French right across the wide open plain which lay between Marengo and St. Juliano. In this retrograde movement a splendid opening was given for the use of the superior cavalry of the Austrian army. The French, wearied with the tremendous efforts they had made for four hours to maintain their position, at length fell back rapidly, followed closely by their opponents, who, preceded by fifty pieces of artillery, spread terrible destruction among the flying masses.

The retreat was commenced in echelon of squares, and for a time with admirable steadiness, but the Austrians combined the action of all arms with the greatest skill in the pursuit. The Imperial cavalry swept around the retreating columns, being only checked by the most vigorous efforts of the French horsemen under Kellerman and Champeaux.[1] While, however, the French cavalry could arrest temporarily the pursuing dragoons, they could not stop the onward march of the Hungarian infantry, which, advancing steadily, poured in a most destructive fire, nor could they silence the artillery, which, in

[1] Alison, ii. 105.

the intervals between the battalions, moved onwards, incessantly discharging volleys of grapeshot.

This combined attack soon had its effect. The whole plain was covered with fugitives, and the day seemed irretrievably lost to the French. The arrival of Napoleon himself, with a body of fresh troops, temporarily revived the spirits of his men, and checked their retreat, but all in vain. The fortune of the battle was still on the side of the Austrians. Melas deemed the victory won, and had ridden to the rear, leaving his chief of staff to follow up the success, when Desaix, with the French reserves, arrived and entered into action.

It was at this crisis, when the fate of a most decisive action was trembling in the balance, that a celebrated charge of cavalry was made, which, without doubt, turned the scale. The Austrians were pressing on in huge columns as to an assured victory. The formidable appearance of the mass of 6,000 victorious Hungarians caused the troops of Desaix to waver and halt.[1] Kellerman, at the head of only 800 horse, was concealed behind a vineyard with festoons of vines from tree to tree, which rising high completely intercepted the view. Kellerman, watching the struggle, saw his infantry comrades wavering, and the Austrians pressing on. Moving rapidly out of his concealment, he fell suddenly upon the exposed flank of the heavy column, cutting it asunder, capturing 2,000 prisoners, including Zach, the chief of staff, and driving the remainder in utter rout back upon the supports advancing in their rear. Kellerman's own statement is concise. He says: "I see it. I am in the midst of them. They lay down their arms. The whole affair did not occupy so much time as it took me to write these six lines."[2]

This great achievement won the victory for the French. The Austrians retreated into Alessandria. An armistice was concluded the next day, by which all Piedmont and the Milanese were handed over to the French, and the Austrian army allowed to retreat beyond the Mincio. By this battle Napoleon obtained the cession of twelve fortresses, armed with 1,500 cannon, and all this was the immediate result of the stubborn resistance of Desaix's infantry, aided most effectually by the magnificent charge of Kellerman's handful of horse.

The first combat of the campaign of 1805 took place at Wertingen, on the 8th of October, between 8,000 cavalry, under Murat, and twelve battalions of Austrian grenadiers, with four squadrons of cuirassiers under General Auffemberg.

[1] Alison, ii. 106. [2] Ibid.

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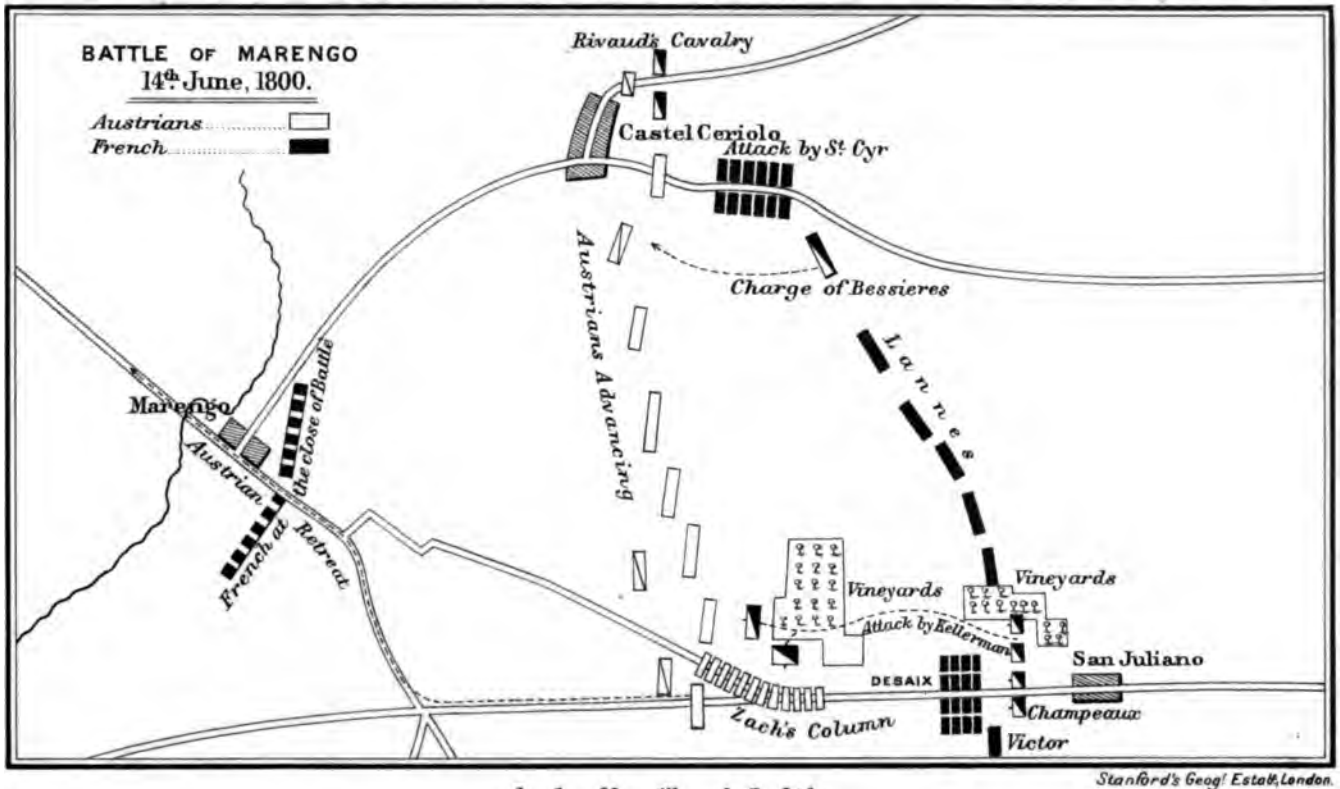

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The Austrians, who were marching in fancied security, were suddenly enveloped by the immense force of French horsemen. Auffemberg at once formed his division in one great square, with the cuirassiers at the angles, and awaited the attack.[1] The French dragoons charged impetuously, and soon swept away the small body of Austrian cavalry, but were unable to effect an entrance into the square, which maintained a steady fire from every face. In vain the heavy cavalry, under Nansouty, made repeated charges with heavy losses. The issue was long doubtful, until some grenadiers arrived under Oudinot, and, supported by artillery, soon staggered and shook the Austrian formation, and gave an opening to the horsemen, who, plunging into the gap, broke the square, and won a complete victory. Three thousand prisoners were taken, as well as all the enemy's artillery.

This combat, being the first in that campaign, gave great confidence to Napoleon's cavalry and paved the way to many subsequent successes. In this campaign of Ulm, we see a still further development of the use of cavalry, for the purpose of pursuing a disheartened and retreating enemy. After several actions, and most brilliant strategical manœuvres, Napoleon had cut off the Austrian army from its line of communication and inclosed it in Ulm. His investment was almost completed, when Mack, who commanded the Austrian forces, decided to send the Archduke Ferdinand with all the cavalry and light troops, to make an attempt to cut through the fast-closing French lines, and so effect his escape into Bohemia.

The column set out on two roads on the 15th of October, while the fight at Elchingen was being furiously contested. The Archduke commanded one column, and General Werneck the other. Murat received orders to pursue vigorously.[2] He came up with their rear guard at Nerenstetten the evening of the next day, and captured 2,000 prisoners. The following day he again struck them at Neresheim, and captured many more prisoners.[3] On the day after the indefatigable Murat again caught up with the exhausted Austrians and surrounded them, and 8,000 men, under General Werneck, despairing of safety, surrendered at discretion to the French cavalry.

Murat then followed, by way of Gundhausen and Nuremberg, the cavalry of the Archduke, which fled in that direction. On the same night on which Werneck surrendered, the great park of munitions and stores was also seized with the artillery and treasure. The 19th October was also occupied in the

[1] Alison, ii. 348. [2] Ibid. 350. [3] Humbert, 179, 180.

pursuit, and on the 20th Murat forced another combat. After several charges on either side the Austrians were dispersed, and many taken prisoners. The Archduke Ferdinand escaped with some 3,000 horse, the only remnant of the large division that a few days before had set out from Ulm.

Murat altogether had captured 12,000 men in four days, during which time he had kept up the pursuit incessantly, marching about thirty miles a day. In addition to the prisoners he had also captured 120 pieces of cannon, 500 waggons, 11 flags, 200 officers, and 17 generals. In fact the cavalry had performed a glorious part in the campaign, and their vigorous use in the pursuit was equal to anything of the kind that had happened since Charles XII. rode his cavalry after the flying Saxons for nine days without unsaddling.

This was the first instance of the kind in Napoleon's wars, but we find many examples of the use of the same system in his subsequent history. In the advance, which at once took place upon Vienna, the cavalry under Murat performed most valuable services, pressing the retreating foe with vigorous pertinacity at every step.

In the next great action, that of Austerlitz, we see Napoleon placing his cavalry in that portion of the plain in which they could best operate, and where the nature of the ground was most favourable to their use. There were a succession of charges of cavalry in this battle, the success swaying from side to side as fresh reserves were poured in. In one of these charges Kellerman's cavalry were attacked by the Austrian cuirassiers under Prince Lichtenstein and instantly broken. The Austrians following up the success broke through the first French line, and swept through the intervals of the second line, when they were charged in turn by Murat with the cavalry of the reserve, and driven back through a terrible fire which opened upon them from the flanks of the squares and columns of the French infantry, and stretched half their number upon the plain.[1]

As an armistice was concluded shortly after this battle the cavalry did not have occasion to perform any special service in the pursuit. The following campaign, that of Jena, however, shows a still further development of the use of cavalry both in action and in following up a success.

Napoleon, with his usual wonderful strategical ability, had thrown his army into the theatre of operations, so as to strike the Prussians unexpectedly in flank and rear before they were

[1] Alison, ii. 370.

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concentrated or ready to receive him. The decisive action took place at Jena on the 14th October, 1806. This battle was opened by Ney, whose fiery energy led him to begin the attack before his troops were properly supported. His cuirassiers at the outset, by one bold charge, carried a battery of thirteen guns posted upon an eminence. The Prussian horsemen also charged bravely upon the infantry under Ney, who, forming in square, held their own until Napoleon despatched some cavalry to extricate them.

After a closely-contested struggle along the whole line, in which the superior numbers of the French enabled them to press back their foe at every point, the villages which the Prussians had held were all taken, and their dispirited soldiers were retiring slowly and sullenly, but in good order. Napoleon saw that the moment had arrived to send in the cavalry to complete the victory. Murat, at the head of 12,000 horse, fresh and in high spirits, moved on in perfect order, and charged with loud cheers upon the retreating foe. The effect was instantaneous. Nothing could withstand the overwhelming torrent of horsemen that flooded over the plain and swept all before it. In vain the wearied and dispirited Prussian cavalry endeavoured to check their advance and cover the retreat of their infantry and artillery. The superior numbers and solid weight of the heavy squadrons of French cuirassiers broke through all opposition, the Prussian cavalry being driven off, the guns captured, and the foot-soldiers sabred. Prince Hohenlohe, who commanded the Prussian army, in an order sent at this moment to General Ruchel, who was coming up with the reserves, gives a graphic picture of the effect of this charge of Murat and his ponderous horsemen.

After telling him to make openings to let the fugitives through his lines, he says: "Be ready to receive the charge of the enemy's cavalry, which in the most furious manner rides on, presses and sabres the fugitives, and has driven into one confused mass the infantry, the cavalry, and artillery."[1]

The victory was complete, and Davoust having defeated the other portion of the Prussian army on the same day at Auerstadt, the fugitives from both fields fled in the direction of Weimar, and Napoleon set to work to make his dispositions for following up the pursuit. The vigour with which that great general pressed a beaten foe was one cause of his great successes as a commander.

The cavalry in the operations after Jena performed the most valuable services. Murat reached the town of Weimar upon

[1] Alison, ii. 455.

the heels of the fugitives, and while a portion of his horsemen penetrated into the town with them, the remainder passed around it and cut off the retreat, so that in a few minutes 15,000 Prussians and 200 pieces of cannon fell into the hands of the French cavalry.

The next day Murat, still pressing on with untiring energy, and closely followed by the infantry of Marshal Ney, arrived before Erfurth, which at once surrendered, and with it 14,000 prisoners, 120 cannon, and immense military stores.[1] The scattered *débris* of the Prussian troops were retiring into the neighbourhood of Magdeburg, and Murat, under the orders of Napoleon, moved from Erfurth towards that point, driving the fugitives all in that direction, knowing that they would ere long become his prisoners.

From Magdeburg, Murat, by rapid marches, moved to Spandau, which surrendered at his first summons, on the same day that Davoust entered Berlin. Prince Hohenlohe, intercepted on his march to Berlin, took the route to Grandsee and Zeydenich for Stettin; but here again the indefatigable Murat, by forced marches, had got the start even of the cavalry of his advance guard, and at Zeydenich, on the 26th October, Hohenlohe was vehemently assailed by Lasalle's hussars and Grouchy's dragoons, and his troops defeated with the loss of 1,000 men.

The following day more fighting took place, in which the Prussian gendarmes of the Guard were enveloped by the French horsemen and obliged to surrender in the open field.

Hohenlohe, cut off from the direct road to Stettin, hoped by the circuitous route of Prentzlow to make his way through, but Murat, hearing of the change of direction and divining his enemy's designs, marched his horsemen across the country all night, from one road to the other, and intercepting him on the morning of the 28th October, attacked his troops in front and flank two leagues beyond Prentzlow. The wearied and demoralised Prussian cavalry were at once overthrown and driven back upon the main body, when, at this critical moment, the infantry of Marshal Lannes, which had marched all night with untiring perseverance, appeared in force upon the right flank. After some hard fighting the Prussian commander was obliged to surrender, and 16,000 infantry, six regiments of cavalry, forty-five standards, and sixty-four cannon fell into the hands of the French.[2] Milhaud, with a detachment of Napoleon's light cavalry, about the same time

[1] Alison, ii. 449. [2] Ibid. 452.

captured at Passelwich 6,000 Prussians, and among them 2,000 cavalry with their horses and equipments.[1]

On the next day, the 29th October, General Lasalle, with a brigade of hussars, advanced to Stettin and summoned it to surrender. On the second summons the place capitulated, and a fortress containing 160 cannon and a garrison of 6,000 was taken without a shot being fired.

This being accomplished, Murat immediately turned to the west and followed without cessation the troops which under Blucher, were retreating towards Lubeck. On the 30th October General Bila, with 4,000 Prussians, was attacked at Anklam and the whole force captured. On the 1st November Blucher's rear-guard was defeated at Nossentin with the loss of 500 prisoners. He was again beaten at Wismar on the 4th November. On the 6th Lubeck was taken by assault, the Prussian infantry being captured or slain, and after another check at Schwartau, Blucher was at last compelled to capitulate at Ratkau on the 7th November, by which 4,000 infantry, 3,700 cavalry, and forty cannon fell into the hands of the French horsemen.

The campaign had scarcely lasted one month. Two cavalry fights, one at Schlitz on the 9th October, and another at Saalfeld the next day, had paved the way for the great battles of Jena and Auerstadt on the 14th of the same month. So complete was the victory, thanks to the overwhelming charge of Murat's horsemen, that when followed up by that impetuous cavalier in a pursuit, unsurpassed for vigour and pertinacity, it resulted in the entire destruction of the whole Prussian military system.

We have given a full sketch of this pursuit of the *débris* of the Prussian army as a good illustration of the *rôle* cavalry should play in following up a victory and completing a success.

Napoleon's next campaign was in Poland and East Prussia, where he at once marched to meet a powerful Russian army which was on the way to aid the Prussians. The campaign opened by the occupation of Warsaw by the French on the 30th November. This was followed by the advance of Napoleon's army and the battles of Pultusk and Golymin on the 26th December, 1806. In the first of these battles Benningsen used his Cossacks to form a screen behind which he most skilfully made his dispositions for battle. The battle of Eylau, which followed on the 8th February, 1807, was one of the most closely-contested and bloody battles recorded in history, and both armies claimed to have won the victory.

[1] Humbert, 196.

In this action the cavalry on both sides performed most valuable services.

The battle was opened by Napoleon with a heavy attack upon the Russian right and centre by the corps of Augereau and Soult, preceded by 150 pieces of cannon. As soon as the troops of Augereau had advanced a few hundred yards the Russian batteries opened a most destructive fire upon them from 200 guns, which inflicted terrible losses in the crowded and massive columns. While shaken by this cannonade, a heavy snowstorm came on, hiding the view and darkening the atmosphere. The Russians took advantage of the opportunity, and a large body of infantry, under Tutschakoff, attacked the French division on one flank while a powerful force of cavalry struck them upon the other.

So thick was the snowstorm that the attack was totally unexpected, and the Cossacks were upon the wavering columns before they were seen or steps taken to meet the charge. The result was soon decided. Augereau's corps, struck on both flanks by infantry and cavalry, were attacked with the utmost vigour. Their muskets were almost useless from the wet and snow which caused them to miss fire, their columns were at once broken and driven back upon the reserves with such carnage that of 16,000 men but 1,500 escaped destruction. This disaster almost ruined Napoleon's army; the Russian right and centre pressed forward, their light troops entered Eylau, and a heavy column approached close to the mound upon which the Emperor was standing and very nearly captured him.

Napoleon's measures were prompt, his calmness and decision admirable. He ordered up his Old Guard to attack one flank and a brigade of Murat's horse to attack the other flank of the advancing Russians, who, elated with victory, pressed on with disordered ranks. Before they could organise to meet the coming storm the French were upon them and almost the whole division cut to pieces on the spot.[1] This saved the French centre, but the disorder caused by it was so great that a vigorous effort had to be made by Napoleon to restore the battle by a desperate attack with his right wing against the Russian left.

This attack was made by Davoust's corps, assisted by a grand charge of the whole cavalry, which was massed for that purpose. The horsemen amounted to the enormous force of 14,000 men, supported by 25,000 infantry, and 200 cannon. Again a snowstorm aided the cavalry, but this time on the side of the French. Murat, at the head of his seventy

[1] Alison, ii. 484.

squadrons, was close upon the Russian lines before his approach was discovered. The shock was irresistible. The front line was thrown into disorder, the cavalry obliged to fall back, and a most obstinate struggle ensued. The Russian battalions though broken would neither fly nor surrender, but uniting in little knots, maintained the fight with dogged pertinacity. Some French horse forcing their way through the Russian lines penetrated far among their reserves, but being charged while in confusion by Platoff's Cossacks of the Don, they were at once destroyed. The long lances of the Cossacks, their wonderful dexterity in using them, and the activity of their horses, gave them a great advantage in the *mêlée*, over the unwieldy and ponderous cuirassiers.

At Serpallen in this part of the field, Benningsen sent his cavalry to charge the flank of Morand's infantry, which caused them to fall back more than 300 yards. After most obstinate fighting in which the carnage was fearful, the action ceased about ten at night, neither party having gained a victory. In fact, an impartial judge would say that both were defeated, for Benningsen retreated, and Napoleon discovered it just in time, to prevent him from also falling back, as he was in fact obliged to do a few days after.

The battle of Eylau has been often referred to by writers on cavalry tactics; and the circumstance of the snowstorm rendering the muskets of the infantry useless, mentioned, to illustrate the fact that in heavy rains and snows, infantry might often be placed at the mercy of cavalry, who relying upon the "armes blanches" could charge the foot-soldiers, when deprived of their great defensive power, the musketry fire. At the present day, however, since the discovery of fixed ammunition, such a thing cannot again occur, and that point loses therefore its interest to the cavalry officers of the future.

It is also stated by Thiers that the Russian infantry in this action, seeing that they could not resist the overwhelming rush of the French horsemen, lay down to let them pass over, when they rose up again and fired into their rear after they had gone by.

The Russian cavalry after Eylau performed most effective service. Murat attempted to pursue Benningsen towards Koningsberg. He had under him twelve regiments of cuirassiers. After a hard engagement he was defeated and driven back, with the loss of 400 killed and 300 prisoners.

It was in this campaign that Napoleon for the first time felt the difficulty of carrying on a war against a nation whose

armies were covered by such efficient light cavalry as the Cossacks. In subsequent wars, in the disastrous retreat of 1812, in 1813 and in 1814, on the plains of Germany and the east of France, numberless blows were struck against him, by the irregular light horsemen of Russia.

After this defeat of Murat's cuirassiers, the Cossacks became bolder and more enterprising. Their incursions were incessant, night and day were alike to them in their unceasing vigilance; the French foraging parties were cut off, their messengers intercepted, their positions continually attacked. So effective were the Cossacks in the duty of light cavalry, that the French could not levy contributions, and could not feed their army except with great difficulty. In ten days Napoleon found that he was obliged to fall back into winter quarters, having lost in that short time 1,500 cavalry, captured by the indefatigable horsemen of the Russian Emperor.

It is a fact well worthy to be remembered, that this was the first campaign that Napoleon ever fought in which his successes were not decisive and vigorously followed up. To the Russian cavalry can be attributed the great change, and we shall soon see how the influence of these irregular and undisciplined horsemen was in the end the most important influence in destroying the gigantic power founded by the marvellous military genius of the great Napoleon.

Some heavy cavalry fighting occurred at the battle of Eckmuhl on the 22nd of April, 1809, where a battery of sixteen Austrian guns was captured by a charge of Bavarian horsemen. In the retreat towards Ratisbon at the conclusion of the battle, the Austrian cuirassiers and hussars were drawn up in front of Egolfsheim to cover the retreat of their infantry and artillery. The French columns were obliged to halt until their cavalry came up to support an engagement. The Austrians charged first, and we find the practice of firing while mounted again showing itself. The cuirassiers of Nansouty and St. Sulpice received the enemy with a discharge of firearms, followed by an attack at the gallop, which threw back the Austrians upon their reserves. These charged again, and the whole force mingled together, swayed backwards and forwards, in a desperate hand-to-hand struggle, in which the noise of steel clashing against steel, of sword blades ringing upon casque and cuirass, raised a din above the other sounds of battle. The sun set and the moon arose before the loud clang arising from the *mêlée* had ceased. The Austrian cuirassiers, armed only with breastplates, fought at a disadvantage with the French horsemen, who were pro-

tected all around. After fearful losses they were obliged to give way, and the struggle settled definitely the superiority of Napoleon's cavalry.[1]

At Wagram the cavalry made many charges on both sides. The Austrian cuirassiers, charging in flank the infantry of Massena, just as they were disordered by a successful attack upon the village of Aderklau, drove them back, and put almost the whole of Massena's corps into confusion, which the most desperate efforts of Napoleon himself, with large reinforcements, alone could repair. The cuirassiers of St. Sulpice, by repeated charges, checked the advance of the threatening columns of the enemy's infantry, and under cover of the cavalry and artillery the French lines were soon re-formed.

Heavy cavalry fighting took place on the French right, where Davoust was turning the Austrian left, but these combats contain no feature of special interest. They serve as a further illustration, however, of the effect of fresh reserves thrown into a cavalry action. The French horsemen under Grouchy were at first victorious, and drove back Rosenberg's cavalry with great slaughter. Hohenlohe's cuirassiers were at once brought up to restore the action, and Grouchy was in turn defeated, and forced to the rear, when Montbrun, coming to his assistance with a fresh corps, charged the Austrians when blown and disordered by their success, and settled the fate of the struggle in favour of the French.

In the left of the field the French cavalry lost so severely by artillery fire as to be unable to effect anything, and the result was that the horsemen, worn out by the exertions of a long day's fighting, and weakened by their serious losses, were unable to operate with any vigour in the pursuit, so that scarcely any prisoners were taken, and no guns. Napoleon was much displeased, and blamed severely his cavalry generals. "Was ever anything seen like this?" said he. "Neither prisoners nor guns. This day will be attended with no result."[2]

At the battle of Dresden, Murat, who commanded the French horsemen, was able, under cover of the mist and rain which concealed his movements, to steal around the allied left flank, and to form up his whole force close to and perpendicular to the enemy's lines, without being discovered. Then in the heat of the battle, while pressed by the French infantry, 12,000 chosen horsemen suddenly burst out of the mist upon the enemy's flank and rear. In an instant their

[1] Alison, iii. 189. [2] Duc de Rovigo, iv. 114; Alison, iii. 253.

lines were scattered and cut to pieces, three-fourths of the entire corps which formed the left wing being killed or captured. This gallant charge gave Napoleon the victory.[1]

The cavalry were employed very effectively in many of the subsequent campaigns of Napoleon, as for instance, at Leipsig, Fère Champenoise, and Waterloo, but as by this time the other European nations were beginning to use the cavalry somewhat upon Napoleon's system, and as we shall have occasion, when considering the cavalry of the other countries, to refer to these battles, we will not discuss them at this moment, but treat of them in a subsequent chapter.

The illustrations we have given, however, will serve to convey to the reader a clear idea of the manner in which Napoleon used his cavalry, and the effects it produced in his campaigns. He valued very highly the services of light horsemen in obtaining intelligence of the enemy's movements. We have already referred to his great ability in gathering an idea of the designs of his opponents. His writings team with passages showing the extraordinary care he bestowed upon this point.

He valued most highly the same quality in his cavalry officers. His remarks on General Steingel, who was killed in the early campaigns in Italy, show the high appreciation he had of that officer, and his idea of what a light cavalry general should be. He says: "General Steingel, an Alsatian, was an excellent hussar officer; he had served under Dumouriez in the campaigns of the North, he was adroit, intelligent, vigilant. He united the qualities of youth to those of advanced age; he was a true general of advanced posts.

"Two or three days before his death he was the first to enter Lezegno. The French general arrived there some hours after, and everything he required was ready.

"The defiles and fords had been reconnoitred, guides had been secured; the priest, the post-master, had been examined; communications had been opened up with the inhabitants; spies had been sent out in many directions; the letters in the post had been seized, and those which could give military information translated and analysed, and measures were taken to form magazines of subsistence to refresh the troops."[2]

Napoleon's views on the various methods of obtaining intelligence are so comprehensive and so forcible, that every cavalry officer should be well acquainted with them. They are fully detailed in a letter to his brother, King Joseph of Spain. He says: "We have no accounts of what the enemy

[1] Alison, iv. 138. [2] Brack's "Avant Postes de Cavalerie Légère."

is about—it is said no news can be obtained, as if this case was extraordinary in an army, as if spies were common. They must do in Spain as they do in other places. Send parties out. Let them carry off the alcade, the chief of a convent, the master of the post or his deputy, and, above all, the letters. Put these persons under arrest until they speak, question them twice each day, or keep them as hostages. Charge them to send foot-messengers, and to get news. When we know how to take measures of vigour and force, it is easy to get intelligence. All the posts, all the letters must be intercepted; the single motive of procuring intelligence will be sufficient to authorise a detachment of 4,000 or 5,000 men, who will go into a great town, will take the letters from the post, will seize the richest citizens, their letters, papers, gazettes, &c. It is beyond doubt that, even in the French lines, the inhabitants are all informed of what passes; of course out of that line they know more; what, then, should prevent you seizing the principal men? Let them be sent back again without being ill-treated. It is a fact, that when we are not in a desert, but in a peopled country, if the general is not well instructed it is because he is ignorant of his trade. The services which the inhabitants render to an enemy's general are never given from affection, nor even to get money; the truest method to obtain them is by safeguards and protections to preserve their lives, their goods, their towns, or their monasteries."

Napoleon used his cavalry very skilfully to cover his own movements, and the result was that his brilliant strategical plans were generally successfully carried out through the perfect manner in which his cavalry aided him in masking his designs from the enemy. His ability to discover the intentions of his opponents was not more marked than his capacity to conceal his own.

His expedition to Egypt was almost a surprise. His departure from that country would have failed but for the secresy with which it was effected. His campaign of Marengo succeeded through the ability with which he deceived all Europe as to the course he was about to adopt. His march to Ulm in 1805, covered as it was by the admirable horsemen led by the gallant King of Naples, was hidden from the Austrian general until his right was turned, his communications cut off, his army cooped up in a fortress, and no resource left open to him save to surrender. In this campaign Napoleon's cavalry formed a screen, behind which Mack could see nothing, and so a magnificent strategical combination was successfully completed.

In the campaign of Jena, in 1806, we have seen how Napoleon took the Prussians entirely by surprise, which was also in a great measure due to the judicious manner in which the cavalry were employed to cover his movements. In Spain also Napoleon's marshals used their dragoons after the example set them by their great leader. There, however, the French worked at a great disadvantage, as the whole population was bitterly hostile, and a national war was being waged. The dragoons, however, won great glory in the Spanish campaigns, and were the most useful force that could have been employed in the style of guerrilla warfare, which was carried on for so long a time in that country.

Napier says, in his "History of the Peninsular War," that in the operations in Portugal, before the battle of Vimiera in 1808, the number and activity of Junot's cavalry completely shrouded his position from the English general, and hemmed in the British troops so closely that they could obtain no information of what was going on outside their lines.[1] After the battle of Valencia we see Marshal Suchet sending detachments of dragoons in pursuit of the flying Spaniards, each dragoon having an infantry man behind him. These parties by their rapid movements prevented the enemy from rallying, and completely dispersed them.[2] In this war the French dragoons often dismounted to use their carbines on foot.

Napoleon's wars produced some very good cavalry generals, although hardly any that would be classed as the equals of Seidlitz and Ziethen. Many had the dash, the *élan*, but lacked the cautious judgment that is so necessary a qualification for a cavalry commander. Napoleon had not a single cavalry general who could be considered so great a genius as Oliver Cromwell.

Murat stands out as the most brilliant and striking figure of the galaxy of famed soldiers who surrounded the great Napoleon. His daring intrepidity was unequalled, his energy unsurpassed, while his chivalrous demeanour, his handsome face and noble carriage, made him a universal favourite among the horsemen he commanded. His showy uniform, his great stature, the incomparable seat with which he bestrode his magnificent and brilliantly equipped chargers, attracted universal attention. His indefatigable energy and his marked bravery were the two qualities that gave him his high reputation and so many successes, but his judgment was not so good. No one knew this better than Napoleon, who said of him: "He was a paladin in the field, but in the cabinet destitute of either decision or judgment; he loved, I

[1] Napier, 55. [2] Ibid. 421.

may rather say, adored me; he was my right arm, but without me he was nothing. In battle he was perhaps the bravest man in the world: left to himself he was an imbecile without judgment."[1]

One incident in Murat's career shows more powerfully than any other the extraordinary energy and impetuosity of his character. On the invasion of Russia in 1812, Murat commanded the cavalry of the advance. From the 24th June, when the French army crossed the Niemen, until the 14th September, the invading host had toiled on day after day, continually skirmishing with the Russian rear-guard. Murat with his horsemen headed the pursuit. From morning till night, under a burning sun and enveloped in clouds of dust, their horses continually dropping from fatigue, the French squadrons steadily and perseveringly moved onwards. Every hour Moscow was in the minds of the soldiers. It was the object of the journey, the resting-place from their toil, the prize of all their labour. After fighting sixty battles and combats, and after three months of incessant marching, Murat at last arrived at Moscow, which the Russians had evacuated. He entered the city with his horsemen, and found it deserted. In the true spirit of an impetuous cavalry officer, he never halted, but moved on through the city, out from the further gates, and coolly took up the pursuit of the Russians, calmly setting his face towards Asia and the boundless plains of the East.[2] That one fact, betokening such restless and untiring energy, is to the mind of the writer a stronger testimony to Murat's character, as a commander of horse, than any one act in his long and chequered career.

Of the other cavalry officers, Kellerman gave evidence of great ability in the charge effected by him at Marengo, as already mentioned, and in many other battles he showed that he possessed the qualifications of a good cavalry chief. Marshal Marmont considered that Kellerman, Montbrun, and Lasalle were the only three good leaders of horse that the French army produced in the twenty years of Napoleon's wars. Bessières, who commanded the cavalry of the Imperial Guard, was also an efficient officer. Steingel had the qualities requisite to make a good cavalry leader, but he was unfortunately killed at an early age, before the opportunity had been given to enable him to acquire a great reputation. Napoleon however has left a record of his qualifications which we have already transcribed.

[1] Alison, iv. 101. [2] Segur, ii. 37.

CHAPTER XXV.

CAVALRY UNDER NAPOLEON (*continued*).

SECTION I.—RUSSIAN CAVALRY UNDER ALEXANDER I.

THE Napoleonic wars, in addition to developing in the French armies a very effective cavalry force, one equally useful both upon the field and in the minor operations of war, also brought forward prominently the vast hordes of irregular cavalry which served under the Russian standard.

The vaulting ambition, the restless energy, and the warlike character of Napoleon led him into wars in every clime, from the burning sands of Egypt to the snow-clad steppes of Russia. No general ever lived who had so vast and so varied an experience. He fought against highly trained professional soldiers in Prussia and Austria, and against tumultuous risings of the population in the national war waged against him in Spain. And to complete his experiences, he fought a campaign in Russia in 1812, against a foe whose principal strength consisted of swarms of irregular horsemen from the plains of Scythia, a foe somewhat similar to that which proved so disastrous to Crassus—a force such as rendered Parthia the only rival to Rome.

The operations of the Russian cavalry, and particularly the Cossacks, in 1812 and 1813, merit careful consideration in a cavalry history; for to the services rendered by that force may be attributed the fall of the most powerful military empire since that of Rome.

The army under the Emperor Alexander I. in 1810 contained, in addition to the other forces, six regiments of cuirassiers, thirty-six of dragoons, eleven of hussars, and five of Uhlans. These were all regular troops. In the Guard there were also two regiments of cuirassiers, one of dragoons, one of hussars, one of Uhlans, one of Cossacks, and a corps of 100 Cossacks of the Oural. The regiments were composed of five squadrons each, the hussars and Uhlans of

the Guard five squadrons also, while the others had ten squadrons each. The regiments of Cossacks of the Guard however had only three squadrons.[1] In the line each squadron had 151 horses, in the Guard 159. Two new regiments of cuirassiers were organised in 1811, and at the same time the cavalry were separated and formed into divisions, there being two of cuirassiers, eight of cavalry, and one of the cavalry of the Guard. Each division of cuirassiers had five regiments, the cuirassier regiments of the Guard being included in the first. The divisions of cavalry were composed of four regiments of dragoons and two of hussars or Uhlans. The fourth division however had one extra regiment of hussars; while the eighth division had only three regiments of dragoons and one of hussars.

The great strength of the Russian cavalry, however, consisted not so much in the regular regiments of horse, as in the Cossacks, who, in great swarms, crowded to the ranks when the war broke out, and performed services of incalculable value in the campaign.

Nearly the whole of the Cossacks of the Don rallied around the standard of Platoff, and by their indefatigable activity as light-horse, mainly contributed to the extraordinary successes gained by the Russians in the latter part of the war of 1812.[2] These Cossacks, accustomed to horses from childhood, engaged continually in agriculture and the raising of great herds of cattle, form a hardy and vigorous race of horsemen, such as are not to be met with in any other country of Europe.

The Cossacks were armed originally with lances, swords, and pistols, the lance being the principal weapon, and mainly relied on by them in their skirmishes. Their horses were small but swift, well-bred, and capable of enduring great fatigue and protracted marches on the most scanty supply of food. The horses being able to walk very rapidly (according to Sir Robert Wilson as much as five miles an hour) enabled them to make forced marches with great facility, while their speed, when pushed to the utmost, was equal to that of the swiftest chargers in Europe. The pistols were carried in the girdle, and not upon the horse. The Cossack used no spurs, but carried a short whip on the wrist, and from perfect confidence in his horse, in his skill in riding, and in the use of his weapons, he never feared to face any foe in single combat.[3]

They did not at the commencement of the war attack in regular squadrons, as did the other cavalry, but in the usual

[1] Boutourlin, i. 95. [2] Alison, iv. 15. [3] Ibid. ii. 465; Wilson, 27, 28.

method of the horsemen of the East, in a swarm or loose charge, when each man selecting his own opponent, they all swooped down together with loud cries upon their foe. Afterwards, as the war went on, they acquired more discipline, and learned to charge boldly against the best regular cavalry in the French armies, as well as against infantry formed in serried squares.

Many important battles were fought by the Russian troops under the Emperor Alexander against the armies of Napoleon, and in most of them the Russian cavalry did their duty well. At the battle of Austerlitz, while a desperate struggle was going on in the centre of the hostile lines, between the Russian infantry reserves under the Grand Duke Constantine, and a French division under Vandamme, 2,000 Russian cuirassiers of the Guard, led by the Grand Duke in person, fell suddenly upon the flank of the French infantry. The charge was made in the finest order, and with irresistible fury. In an instant the French column was broken, a large portion of it trampled under foot, and an eagle captured. Napoleon was an eye-witness of this splendid charge, and immediately launched against the hostile horsemen the cavalry of his guard under Bessières and Rapp. The sudden onset of fresh squadrons, before the Russians could re-form after their glorious charge, at once overthrew the victorious cuirassiers, captured their artillery, and sent them back over the dead bodies of the square they had destroyed. They soon rallied, however, and returned to the attack, and then the two corps of Imperial Guards meeting in full career, a fearful crash of charging horsemen took place, followed by the most desperate cavalry fighting that had occurred during the war. They fought on both sides with the most determined bravery, and with frightful carnage. At length the Russians had to fall back on Austerlitz, and this encounter had a great influence in deciding the fate of the battle.[1]

We have already referred to the gallant exploits of the Russian cavalry on the field of Eylau, where the Cossacks under Platoff charged successfully the victorious horsemen of Murat, in the celebrated cavalry action that took place on the Russian left in that battle.

In June, 1807, after Benningsen had moved out from his position at Heilsberg to attack Ney, he found it necessary on the concentration of the French army to fall back again to his entrenched camp. The rear-guard under Bagrathion, while covering this retreat, found it necessary to make a stand to give time to the carriages and guns in the rear to defile

[1] Alison, ii. 371.

across the Alle, by the four bridges which spanned it at that point. Bagrathion formed his force, consisting of only 5,000 foot and 2,000 horse, at Glottaw, and sent forward his cavalry to check the pursuers. The infantry formed squares to withstand the attack of Murat, who, at the head of 12,000 horsemen, pressed vehemently upon them. On this day the Russian cavalry displayed the most astonishing valour. The odds against them were fearful, but such was the steadiness and intrepidity of the Russian troops, that not a square was broken, nor were the squadrons of horse dispersed or routed. After a sanguinary fight for a long time without any decisive result, the Russian commander having gained time for the whole of the baggage and artillery in his rear to effect the passage of the river, at length fell back slowly, and crossed the bridges without serious loss, and in good order. This action reflects the highest credit on the Russian cavalry.[1]

In the advance of Napoleon upon Moscow, it was not long before the Russian horsemen began to acquire a high reputation. The first engagements of the campaign took place on the 9th and 10th of July, and in both instances the Cossacks were met by Polish cavalry, and in both cases were completely victorious.[2]

Nor can we refrain from mentioning here the action which took place near Krasnoi between the Russian rear-guard, 6,000 strong, with 1,200 horse, under General Newerofskoi, and the leading column of the French army under Ney and Murat. Newerofskoi was surrounded and vigorously assailed by 18,000 horse, but he bravely determined to fight it out, and refused positively to surrender. Forming his force into two squares, which he afterwards united into one, he retired slowly and steadily across the broad open plains through which his course lay, continually repelling the charges which were repeatedly made by the numberless French squadrons, who charged him more than forty times during the day. On several occasions the French succeeded in breaking into the ranks, and even cut down Russian officers in the centre of their squares. But continually closing together and presenting a firm array and well-sustained fire, they kept off the enormous host by which they were surrounded, effected their retreat during the whole day, and reached Korytnia at night with unbroken ranks, but with a loss of 1,000 men and five guns. This is one of the most striking instances on record of a successful infantry defence against an overwhelming force of horsemen upon an open plain.

[1] Alison, ii. 531. [2] Ibid. iii. 547.

At the battle of Borodino a most brilliant charge of cavalry was made by Ouvaroff at the head of the 1st corps of cavalry, and some regiments of Cossacks, upon the left flank of Prince Eugene's corps. He crossed the Kolotza and first overthrew Ornano's brigade of cavalry, which was upon that flank. An Italian division under General Delzon saved itself by promptly forming in squares. The baggage and artillery waggons fled in confusion, and the Viceroy Eugene himself narrowly escaped capture by getting into one of the infantry squares. Napoleon, alarmed at the confusion, and deeming the attack serious, galloped to the spot, followed by the cavalry and artillery of the Guard. Ouvaroff, finding himself threatened by greatly superior forces, withdrew across the river, his gallant charge having created a most important diversion by withdrawing a portion of the reserves from the decisive point of the battle-field. This charge sensibly checked and delayed the success of the French.[1]

The battle of Borodino is remarkable in a cavalry point of view, on account of the celebrated capture of the great redoubt by a charge of cavalry. Napoleon made preparations for a tremendous attack with an enormous infantry force, aided by 200 guns, while he directed a charge of cavalry to endeavour to penetrate the Russian lines, and wheeling around to enter the redoubt by the gorge. Caulaincourt, with Montbrun's cuirassiers, was ordered to make the charge. Alison describes what followed. "'You will see me immediately dead or alive,' was the answer of the brave general, and he set off at a gallop at the head of his followers, and the glittering mass was soon lost in the volumes of smoke as he approached the entrenchment. The Russians hastened by all possible means to support the point of attack. The corps of Osterman was placed in front, and the regiments of the Guards, Preobazinski and Semenowskoie, were stationed as a reserve in their rear, Caulaincourt, advancing with the utmost rapidity, overthrew the regiments of Russian horse whom Kutusof had opposed to him, while the great redoubt continued to vomit forth an incessant fire upon its assailants. Eugene with his infantry was advancing to the attack ; the bayonets of his troops were already gleaming on its slopes, when the columns of cuirassiers were seen ascending through the clouds of smoke which enveloped the entrenchment. Its sides seemed clothed in glittering steel, and the fire from its summit, after redoubling in fury for a few seconds, suddenly ceased. The flames of the volcano were extinguished in blood, and the resplendent casques of the French cuirassiers

[1] Bourtourlin, i. 341.

appeared when the smoke cleared away, above the highest embrasures of the entrenchment."[1]

Grouchy, following up this attack with his cavalry, advanced against the troops of Osterman while drawn up on the heights in rear; but being charged by the two cavalry regiments of the Russian Guard, they were defeated with great loss, and obliged to fall back upon the infantry.[2]

At the Katzbach, 26th August, 1813, the victory was mainly due to the excellent services rendered by the Russian cavalry of Sacken's corps, under the command of Wassilchikof and some Cossacks under Karpoff. These brave horsemen charged Sebastiani's cuirassiers, as they debouched from the defile of Kroitsch, at Neider Crain, and by attacking them boldly in front and flank, drove them back into the defile, and the whole of the French left were in this way thrown into confusion and obliged to retreat. This compelled Macdonald to retire with his entire army, and in the pursuit the allies won many trophies and prisoners.[3]

At the battle of Culm, on the 30th of August, the allies had 10,000 admirable horsemen to bring into action against Vandamme, who had only 3,000 cavalry in his army. The allies massed their squadrons on their own right, in front of Vandamme's left, where the open plain was suitable to the use of that force. The battle opened with a vigorous charge of the Russian cavalry upon the left flank of the French line, which was totally unsupported, and unable to oppose an effective resistance. This attack swept all that portion of Vandamme's line back upon the centre and right, and so threatened his communications with Pirna as to seriously alarm him. He at once despatched a fresh brigade to stem the torrent of advancing horsemen, but in vain; they only added to the confusion, being at once overwhelmed by the victorious cavalry. This compelled a retreat which, being intercepted by a corps of Prussians under Kliest, turned the French defeat into a disaster. Vandamme and a great portion of his army were made prisoners of war. The French cavalry, under Corbineau, however, set an example of what horsemen should do under such circumstances. Seeing his retreat cut off, his force surrounded by immensely superior numbers of victorious enemies, Corbineau took the bold plan of cutting his way out. At the head of his horsemen, he dashed up the steep and almost impassable defile, filled as it was with advancing Prussians, with such vehemence, that he broke right through their column, cut down their gunners, captured their pieces (which, however, he could not carry off),

[1] Alison, iii. 564, 565. [2] Boutourlin, i. 344. [3] Alison, iv. 146.

and succeeding in effecting his retreat. This is a good illustration of the maxim that cavalry should never surrender in the field, and a proof of its correctness.

On the 16th October, 1813, at Leipzig, the greatest battle of modern times commenced, and at the very outset a most brilliant charge was made by two regiments of Russian cuirassiers, led by Lewachow against the French right. Soon afterwards Napoleon ordered an attack in great force against the allied centre and left. Kellerman, at the head of 6,000 horse, advanced boldly, overthrew Lewachow, and was driving all before him, when the Austrian cuirassiers of the guard, six regiments in all, under Count Nostitz, having rapidly crossed the Pleisse, arrived at the critical moment, and instantly charged vehemently, with loud shouts, upon the flank of Kellerman's squadrons, who were pressing on with ranks disordered by success. The fresh reserves and the flank attack at once settled the fate of the combat. Kellerman was instantly routed and driven back to the protection of the artillery and infantry of the French lines, where he soon re-formed. This decisive charge of the Austrian cuirassiers saved the allies from a serious defeat in the left centre of their position.

Almost at the same time, or shortly after this combat, another desperate effort was made by the French cavalry, under Latour Maubourg, and Murat, to break through the allied lines in their right centre to the east of Wachau. These gallant cavalry leaders, at the head of a mass of 4,000 or 5,000 cuirassiers, without either a second line or a reserve, moved on in admirable order, and striking the infantry of Prince Eugene of Wurtemberg in flank, threw it into confusion, overwhelmed ten squadrons of the Russian Guard which tried to check them, and captured a large number of cannon. The charge was successful, and so terrible in its results that the whole centre seemed broken. The Emperor Alexander and the King of Prussia were obliged to fall back to avoid capture, and a disaster to the allies appeared inevitable. The Emperor of Russia, with admirable coolness, ordered up the Red Cossacks of the Guard under Orloff Denizoff to charge one flank of the victorious horsemen, while Barclay, with the reserve cavalry, was at once commanded to advance to their support. The dispositions of the Emperor saved the battle. The Cossacks under Denizoff struck the French, when, their leader Latour Maubourg seriously wounded, their horses blown by their charge, and their ranks broken by the capture of the batteries, they were unfit to oppose any effective resistance. In an instant the

whole mass was pierced through and routed, twenty-four guns recaptured, and the French cuirassiers driven back with great loss to their own lines. In this one battle, in the course of a few minutes, were two victorious charges of cavalry turned to defeat by the neglect of not holding reserves in hand. Many other cavalry actions took place in many of the subsequent battles of the war, but it would be mere useless repetition and a tedious swelling out of this work beyond its necessary dimensions to insert any further illustrations. There is one battle, however, which cannot be overlooked, as it was fought between 22,000 cavalry and 128 guns, against a French force of almost the same numbers, but consisting of 17,000 infantry, 5,000 cavalry, and eighty-four guns.

This battle, which took place at Fère Champenoise, on the 25th March, 1814, was opened by the advanced guard, which consisted of the Russian chevalier guards and cuirassiers. They attacked vigorously the retreating French, who, forming their infantry into squares, were steadily falling back protected by their artillery and cavalry. The allied horse, coming up in great numbers under the Grand Duke Constantine and General Nostitz, soon overthrew the French dragoons, and captured some forty-four guns. A rain-storm wetting the muskets rendered them useless, and the French infantry, deprived of their artillery, their weapons dumb and harmless, were seized with a panic, and soon fled in confusion through Fère Champenoise. The gallant conduct of a regiment of heavy cavalry, under the command of the brave General Le Clerc, who charged with the utmost vigour to cover their retreat, and the approach of night, alone enabled the French marshals to restore order to the remains of their army.

While this was going on in one portion of the plain, the Emperor Alexander in person, accompanied by the King of Prussia and a large body of cavalry, fell in with a French division under General Pacthod, who was in charge of a great convoy of guns and provisions, and who had been bravely resisting the attacks of Generals Korf and Wassilchikoff, who had attacked him boldly with some of the finest regiments of the Russian cavalry.

Sir Archibald Alison gives a most vivid description in his "History of Europe" of the gallant fight that ensued after the arrival of the Russian Emperor upon the field.

"As soon as Alexander was aware that this corps consisted of enemies, he took the most prompt measures to encompass them and accomplish their destruction. The

Russian and the Prussian cuirassiers of the guard were formed on the right—Korf's hussars, who had moved parallel to them in their cross march, in front—and Wassilchikoff's dragoons on their left rear. Thus 9,000 chosen horse supported by seventy guns were ready to assail about 6,000 infantry without cavalry, and with only sixteen pieces of cannon. Having thus environed the enemy, Alexander, to prevent a useless effusion of blood, summoned the French general to surrender. Pacthod, albeit sensible that escape was hopeless, nobly refused, and briefly haranguing his soldiers, exhorted them to die like brave men in defence of their country. Loud cheers followed the generous appeal, and immediately the firing began. Formed into squares, with the ammunition and carriages in the centre, they bravely began a rolling fire, still continuing to retreat towards Fère Champenoise, and for some time repelled all the charges of the Russian horse. At length, however, the guns, one battery of which was under the immediate command of Lord Cathcart, to whom the Emperor, who was on the spot, had given its direction, were brought to bear upon them. Such was the deadly precision of their fire, that lanes were soon made in one of the squares, and the cavalry breaking in at the apertures, the whole were cut down or made prisoners. Meanwhile the intelligence spread like wildfire through the Russian columns that the Emperor was in danger: with inconceivable ardour the troops rushed forward; hussars, light dragoons, uhlans, and cuirassiers came up at speed or full trot, and dark clouds of dust darkened the air, and at last 13,000 were on the field. Still the other squares of the French refused to surrender; they even fired on the Emperor's aide-de-camp Rapatel, whom he had adopted as a legacy from Moreau, who fell dead on the spot; and Alexander, seeing there was nothing else to be done, gave the signal for a general charge. At the head of his chevalier guards, that brave prince threw himself upon the squares, and dashed in at one of the openings made by the cannon; the guards, roused to the highest pitch by the presence and danger of their beloved Czar, followed with irresistible fury, and the square was penetrated on all sides. Still the French, with heroic resolution, refused to submit; some in tears, others almost frantic with indignation, kept firing till their last cartridge was exhausted; and Pacthod, in the centre of the square, only surrendered his sword to the Emperor in person. Three thousand of the French, many of them national guards, fell nobly resisting on this fatal occasion."[1]

[1] Alison, iv. 382, 383.

The examples quoted in the foregoing pages will convey to the reader a pretty clear idea of the method of fighting in action, adopted by the rival forces of cavalry in the wars of Napoleon, but the influence of the light horse of the allied armies, and particularly of the Cossacks of Russia, in the minor operations of war, were of so important a character as to require very careful consideration. We have seen the extraordinary influence exerted upon the operations of Frederick the Great by the irregular and undisciplined horsemen of the Austrian service, who, although totally unable to stand before the highly-trained cavalry of the Prussian king, were nevertheless far more than a match for them in detached or outpost service.

Napoleon also met his first check, from the same cause, namely, the superiority of his enemy in light horsemen suited to partisan warfare. We have already drawn attention to this point, in our last chapter, in referring to the services of the Cossacks under Benningsen after the battle of Eylau. This was the first instance in Napoleon's life, in which he was obliged to retreat after a pitched battle. Although technically victorious at Eylau, it was really a drawn battle, but one that would have been rapidly turned into a great success, had it not been for the Cossacks.

From this period we can trace, from step to step, the tremendous influence these irregular horsemen exerted upon his fortunes, until at last in the campaign of 1814, Napoleon, driven to the wall, was obliged to abdicate his empire. It was after the arrival of Napoleon at Moscow that the Cossacks began to make themselves seriously felt in the operations against the invading army. For some time, a species of armistice was tacitly observed between the main armies, and it was at this period that the irregular horsemen commenced a partisan warfare of the most destructive character on the flanks and rear of the French position. These troops cut off the foraging parties, and soon formed a cordon around Moscow, which, occupying all the roads, captured the convoys of supplies and virtually held the army of Napoleon in a species of investment. The scarcity of provisions so occasioned was soon most severely felt; forage for the cavalry horses was so difficult to obtain, that the dragoons were obliged to go to great distances in search of fodder, and moving out so far away from their lines, they were often cut off and captured by the Cossacks, who swarmed throughout the whole country. In three weeks, in the month of October, these light troops in the neighbourhood of Moscow actually captured as many as 4,180 French soldiers without a battle being fought. Murat

at this time reported that one-half of the whole force of French cavalry, that had survived the advance to Moscow and had reached that place, had perished in the indecisive but incessant skirmishes that had been going on at the outposts.[1]

This reduction of the French cavalry weakened their army seriously, and made the subsequent operations of the Cossacks on the retreat more decisive, on account of the great superiority they had acquired. The operations were resumed by the Russians on the 18th October, when an attack was made upon the troops under Murat, at Winkowno. The attack on his left rear, by Count Orloff's cavalry, soon threw Murat's troops into confusion, and compelled him to retreat, with the loss of 1,500 prisoners, 38 cannon, and his whole baggage.[2]

Napoleon at once set out for Kalouga, but being checked in his march, by the battle of Malo Jaroslawitz, he rode on to inspect the scene of action. While he was moving, in apparent security, in the midst of his army, the cry was raised of the Cossacks. "It is Platoff! they are 10,000." At first Napoleon would not believe it, and he was in imminent danger of being captured. His aide-de-camp, General Rapp, was unhorsed, and the vigorous efforts of the escort who fought bravely, and the advance of the grenadiers à cheval and the dragoons of the guard, alone saved the Emperor from being taken.[3]

This attack was made by Platoff, with ten regiments of Cossacks, and the 20th regiment of Chasseurs, with the object of seizing a park of artillery. The guns were taken, but only eleven carried off, from the want of horses, and the rapid approach of the cavalry of the Imperial Guard.[4]

This affair had the most important consequences, and affected materially the result of the war. It dispirited Napoleon, proved to him the superiority of the light troops of the enemy, the weakness and inferiority of his own cavalry, and this at a moment when everything depended on his acting boldly and decisively. A council of war was held the same night, and the great question, as to whether an attempt should be made to force the passage by way of Medynn, or whether the retreat should be ordered to the old road from Smolensk to Moscow, was hotly discussed.[5] Murat vehemently urged the bolder and more impetuous course, but the other officers disagreed with him, and it is said that the report of another warmly contested fight with the Cossacks

[1] Alison, iii. 575, 576. [2] Ibid. 578.
[3] Boutourlin, ii. 165; Alison, iii. 580. [4] Boutourlin, ii. 165.
[5] Segur, ii. 114.

near Borowsk, a few miles to the rear of the army, turned the scale, and led Napoleon to retreat; a course that in the end proved disastrous to him.[1] At the same moment that he retreated, Kutusof also fell back to Kalouga, proving that Murat's advice was the better, and that his plan would have proved successful. The operations of the Cossacks, therefore, secured this great advantage to the Russians.

Thus began the celebrated retreat on the 26th October, 1812, which was continued until the 13th December, and during that long period scarcely a day passed in which the Cossacks did not render valuable service, as Platoff pressed continually the French rear-guard. The want of provisions now began to be felt by the retreating army, and the most frightful disorders resulted from the sufferings caused by this want. Baggage waggons were abandoned at every step, the horses failing from starvation. The troops soon began to scatter in search of food, and horses, that were required for other purposes, were slain in great numbers to feed the famishing soldiers.

At Wiasma a severe action took place on the 2nd November, where the French rear-guard, being intercepted by General Wassilchikoff, only escaped with great difficulty and with the loss of 6,000 men. The Cossacks constantly hovered around the retreating masses, and the troops, dying of starvation in their ranks, were either massacred by the peasants or captured by the Cossacks if they straggled in search of food. The intense frost added to the horrors of the retreat, combining to make it the most terrible disaster in the history of war.

It is commonly supposed that it was the severity of the weather that was the principal cause of the failure of the expedition of Napoleon into Russia, but the more the details of that extraordinary campaign are studied, the more clearly will it appear that the real cause of the destruction of the French army was the great superiority of the Russians in light troops.[2] The immense distance to which Napoleon had penetrated from his magazines and base of supplies rendered it exceedingly difficult to feed his troops, a difficulty that was greatly augmented by the immense numbers that were massed under his standard.

As soon as the superiority of the Cossacks in outpost and detached service was fully established, foraging was put a stop to, and famine and want soon relaxed the discipline and destroyed the energies of the French troops. It was this more than the cold that ruined the French army. Alison

[1] Segur, ii. 117, 118. [2] Alison, iii. 599.

says that "the campaign would have been equally fatal to them even though Moscow had not been burned or the frosts of winter had never set in."

"When an army rushes headlong into the middle of the Scythian cavalry, without having the means from resources of its own of providing itself with subsistence and forage, it is certain to be destroyed. Alexander the Great wisely avoided such a danger, and contenting himself with a barren victory over the Scythians on the banks of the Oxus, turned aside from their inhospitable country. Darius, with all the forces of Persia, penetrated into it and perished. The legions of Marc Antony and Crassus sank under the incessant attack of the Parthian horse; the genius of Julian proved inadequate to the encounter; the heroism of Richard Cœur de Lion was shattered against the innumerable squadrons of Saladin. The very magnitude of the carriages with which an European army invades an Asiatic territory proves the immediate cause of its ruin by augmenting its encumbrances and accelerating the period when, from being surrounded by the light horse of the enemy, it must perish from want. The enterprise of Napoleon against Russia thus proved abortive from the same cause, which, in every age, had defeated the attempts of refined nations to penetrate the Eastern wilds; and it is a striking proof of the lasting influence of general causes on the greatest of human undertakings that the overthrow of the mightiest armament which the power of civilised man ever hurled against the forces of the East was in reality owing to the same causes which, in every age, have given victory to the arms of the shepherd kings." [1]

This campaign caused the introduction of partisan warfare. Colonel Davidoff, who wrote a treatise on the subject, recommended and carried out this system of using light troops, and in the course of the retreat inflicted many losses upon the French by attacking unsupported points along their line of communications. Several detached parties of French were captured by these partisans. The advanced guard of General Baraguay d'Hilliers, under Augereau, were made prisoners at Liakhowo to the number of 2,000 by Count Orloff Denizoff aided by Davidoff, Seslawin, and Figner.[2] A depôt of 1,300 French at Klemenstiewo was also surprised and the whole force captured by Colonel Bistrom, at the head of a detached corps consisting of two battalions of chasseurs of the guard, a squadron of cuirassiers, and 100 Cossacks.[3]

The Russian cavalry at this time produced some first-class leaders of horse, of whom Platoff stands out the foremost.

[1] Alison, iii. 599. [2] Boutourlin, ii. 201. [3] Ibid. 203.

Ouvaroff, Palen, Orloff Denizoff, Davidoff, Tchernicheff, Figner, and Seslawin also performed the most distinguished services, while in the campaign of 1813 and 1814 the Grand Duke Constantine proved himself to be a most gallant and brilliant cavalry commander.

In the campaign of 1813 the partisan operations in rear of the French army were much more numerous, and carried out in a much bolder manner, than in any of the previous campaigns of the age, and in these operations the Russian cavalry and their generals shone conspicuous.

The first important affair of the campaign of 1813 was the capture of Hamburg by a partisan corps consisting of 3,000 foot and 3,000 Cossacks under Tettenborn, an active and energetic officer. Shortly after Tchernicheff, Benkendorf, and Doernberg, uniting their Cossacks and light troops, made a forced march of fifty miles in twenty-four hours to relieve the people of Lunenberg, and having defeated General Morand, with the loss of 1,000 killed and wounded, captured the remainder of his force, consisting of 2,000 men. These successes were all-important, as they encouraged the population to rise and throw off the French yoke, and the German insurrection soon became general.

Later on, in the campaign after Napoleon's victories of Lutzen and Bautzen, the partisan operations in his rear disquieted him greatly, and had a marked effect upon his mind. The recent experiences of the campaign of Moscow were very vivid in his recollections, and his fear of the Cossacks, and other light cavalry of the allies, was not to be wondered at. A partisan corps captured a considerable park of artillery on the 27th May, a few days after the battle of Bautzen, while about the same time Woronzoff's cavalry had fallen in with a large body of French horse near Dessau, and had defeated them with the loss of 500 prisoners.

Two days after, on the 29th May, General Tchernicheff, who was lying near Magdeburg, hearing that the Westphalian general, Ochs, was at Halbertstadt, with a convoy of artillery, decided to surprise him. He set out on the 29th, with a strong force of hussars and Cossacks, and moving rapidly all afternoon and night, arrived at five in the morning within reach of the enemy, after having marched fifty miles. General Ochs was completely surprised, and at once routed with the loss of all his guns, and the capture or destruction of his whole force of 1,200 men.[1]

From Halbertstadt Tchernicheff re-crossed the Elbe, and took up a position at Bernberg, while he arranged a combined

[1] Alison, iv. 81.

movement with Woronzoff to surprise General Arrighi, who was at Leipzig, with 5,000 men and considerable magazines. Tchernicheff, by a forced march of thirty-one miles in one day, joined Woronzoff, and, when united, they attacked Arrighi, who was quite unprepared to receive the onset. Just as the victory was about being completed, the action was stayed by the news of the armistice that had been arranged between Napoleon and the allied commanders.

On the renewal of the war, Tchernicheff again proved the great value of a partisan corps of cavalry if well handled. Having taken a prominent part in driving Oudinot into Magdeburg, with heavy losses, after the battle of Grossbeeren, he boldly carried his operations far in the French rear, and with the most signal success into the very heart of Westphalia.[1] At the head of 3,000 horsemen and four light guns, this dashing officer crossed the Elbe at Dassau, and marching with lightning rapidity across Germany, reached Cassel, the capital of Westphalia, on the 30th September. His bold advance and firm demeanour created great consternation among the French authorities. Jerome Bonaparte, the King of Westphalia, was obliged to fly from his capital without firing a shot, and the gallant cavalry partisan entered at the head of his Cossacks, amid the applause of the people, and proclaimed the dissolution of the kingdom of Westphalia. Tchernicheff remained in possession of Cassel for a whole week, and effected his retreat safely without the loss of a man, carrying with him as trophies the stores of the arsenal, the royal horses and carriages, and an immense amount of plunder.

The moral effect of this cavalry raid was greater than the winning of a decisive victory. It proved the hollowness of the position held by Napoleon in the military kingdoms he had established, and its influence was at once forcibly felt all over Germany.

The Cossacks, who at first fought in a loose manner, soon acquired a considerable ability in manœuvring, and from their speed and activity were generally more than a match for the French cuirassiers, who, weighted down by their trappings, were soon wearied out by the incessant skirmishing.

One or two examples, taken from Captain Nolan's "History and Tactics of Cavalry," will serve to convey a clear idea of the method of fighting, and the superiority of the Cossacks in partisan warfare.

"On the 19th August, 1813, when the armistice had

[1] Alison, iv. 159.

expired, the French troops began to push the allies back on Berlin and Potsdam. Colonel Bichalow received orders to make a reconnaissance in the direction of the Luchenwalde, with a regiment of Don Cossacks. These men had bivouacked on the Treboin road, and advanced through Scharfenbrück and Waltesdorff. The French pickets retired at our approach, and afforded us a full view of the fields to the north and east of the Luchenwalde. Presently a large body of cavalry issued in haste from the town, and formed in our front in close column of squadrons; the skirmishers fell in on their flanks, and we had this heavy column only before us. The Cossacks could gain but little against so large a force, but as there was no great risk in assailing it, they were ordered forward. The French advanced at a trot, and, to prevent the Russians getting in betwixt the squadrons, they closed up, and bore right down on the centre of our line, which naturally opened out; the Cossacks attacking the flank and rear of the column. The French, having no one in front to oppose them, halted, whilst their tormentors kept spearing the flank files, and firing into the mass, which soon got into complete confusion, and could undertake no evolution of any sort. The Cossacks, though they never attempted to disperse the mass by a dash at them, still, conscious of their superiority in riding, continued to shoot and spear them, executing partial charges when opportunity offered Meanwhile the flank files of the French faced outwards, and unslung their carbines, and, thus formed in square, they kept up an irregular fusilade for about half an hour. The heads of French infantry columns were now seen advancing from Luchenwalde towards the scene of strife, and as soon as their artillery opened fire, the column of heavy cavalry was released from its dangerous situation. Colonel Bichalow withdrew his troops by way of Scharfenbrück, without being pursued by a single Frenchman."[1]

On the 18th September, 1813, another fight took place near Mühlberg, between General Slowaisky with 1,200 Cossacks, and a force of 2,000 French dragoons. Captain Ganzauge gives the details as follows:—

"The French completed their movements whilst the Cossacks were forming up. They were formed in one line *en muraille*, with a small reserve in rear.

"The Cossacks fell on, and were received with a discharge of carbines. The French did not draw swords. Their fire at first sent the Russians to the right about, and whilst they were re-forming, the enemy wheeled into column, and opened out, so as to get their intervals, and wheeled again into line.

[1] Nolan, 81, 82.

We expected they were about to charge, but their object appears simply to have been to extend their line, and prevent their being outflanked, a common mode of attack with the Cossacks.

"The arrangements being completed on both sides about the same time, the Cossacks were strictly admonished not to shrink from the enemy's fire, their officers receiving orders to cut down the first man that turned.

"Several squadrons were told off to attack the enemy in flank and rear during the conflict. All these orders were steadily obeyed; they pressed in upon the French, and surrounded their squadrons; here I saw myself many of the French dragoons cut down or speared, after firing off their carbines, before they could draw their swords. The French steadily defended themselves at first, as well as cavalry standing still can do against such active adversaries, who swarmed about them on all sides; however, presently some of them turned, and their example was soon followed by the remaining squadrons. The reserve, instead of advancing to restore the fight, joined in the flight; in a short time everyone was galloping towards Jacobsthal, and the entire plain was covered with scattered horsemen. Not one troop was to be seen in close order; it was a regular hunt; and most of those who were taken prisoners in it, had previously fallen off their horses. At last we came upon a line of cuirassiers, in emerging from the wood, and their steady and imposing attitude brought us suddenly to halt, without any word being given; we were quite satisfied with our victory, and turned back to Mühlberg."[1]

General Brack gives us the following important testimony as to the influence of the Cossacks as light troops. He says: "The Cossacks were an arm which rendered the war highly dangerous, especially to such of our officers as were entrusted with making reconnaissances. Many among them, and especially of the general staff, selected by the major-general, preferred forwarding the reports which they received from the peasantry, to going to a distance and exposing themselves to the attacks of the Cossacks. The Emperor then could no longer know the state of affairs." No testimony could possibly be stronger than the above, as to the efficiency of these irregular horsemen.

The following opinion of a French officer, General Morand, as to the value of the Cossacks and their services in the war of 1812, is clear and to the point. He says: "But these rude horsemen are ignorant of our *divisions*, of our regular *align-*

[1] Ganzauge, as quoted in Nolan, 83, 84.

ments, of all that *order* which we so overweeningly estimate. Their custom is to keep their horse close between their legs; their feet rest in broad stirrups, which support them when they use their arms. They spring from a state of rest to a full gallop, and at that gallop they make a dead halt; their horses second their skill, and seem only part of themselves; these men are always on the alert, they move with extraordinary rapidity, have few wants, and are full of warlike ardour. What a magnificent spectacle was that of the French cavalry, flashing in gold and steel under the rays of a June sun, extending its lines upon the flanks of the hills of the Niemen, and burning with eagerness and courage! What bitter reflections are those of the ineffectual manœuvres which exhausted it against the Cossacks, those irregular forces until then so despised, but which did more for Russia than all the regular armies of that empire! Every day they were to be seen on the horizon, extended over an immense line, whilst their daring flankers came and braved us even in our ranks. We formed, and marched against this line, which, the moment we reached it, vanished, and the horizon no longer showed anything but birch-trees and pines; but an hour afterwards, whilst our horses were feeding, the attack was resumed, and a black line again presented itself; the same manœuvres were resumed, which were followed by the same result. It was thus that the finest and bravest cavalry exhausted and wasted itself, against men whom it deemed unworthy of its valour, and who, nevertheless, were sufficient to save the empire, of which they are the real support and sole deliverers. To put the climax to our affliction it must be added, that our cavalry was more numerous than the Cossacks, that it was supported by an artillery, the lightest, the bravest, the most formidable that ever was mowed down by death! It must further be stated that its commandant, the admired of heroes, took the precaution of having himself supported in every manœuvre by the most intrepid infantry; and, nevertheless, the Cossacks returned covered with spoils and glory, to the fertile banks of the Danaetz, whilst the soil of Russia was strewn with the carcases and arms of our warriors, so bold, so unflinching, so devoted to the glory of our country."[1]

It is an interesting and instructive fact that these horsemen were in 1813 and 1814 armed and accustomed to operate upon a somewhat similar system to that which, we shall find, was used most extensively and successfully by the cavalry engaged during the American Civil War. In the campaigns on the Elbe and Rhine the Cossacks fought

[1] In Nolan, 86, 87.

often as mounted infantry. Having referred to the great services of these troopers, we will copy the following letter from Captain Ganzauge, of the Prussian Lancers of the Guard, to Captain Nolan:—

"During great part of the last war against the French I was attached to the Cossacks of the Don. These men were at that time but little accustomed to the use of firearms. Whilst advancing into Western Europe the advantages of firearms became apparent, more particularly when acting on intersected and difficult ground; and the Cossacks managed to arm themselves with French infantry muskets which they picked up on the field. Then originated amongst them the practice of dismounting by turns, where the ground was favourable, and thus engaging the enemy in skirmishing order. I have myself seen them in this way beat cavalry very superior to them in numbers, and infantry also, when either the cavalry or the infantry attempted to attack them singly. In such cases the infantry soldiers opposed to them were afraid of the mounted men, who stuck close to their dismounted comrades with the led horses; and these dismounted men were ready to jump into the saddle at any moment and rush upon the enemy if they gave way or were driven from their cover.

"*To this manner of skirmishing I attribute entirely the success of these Cossacks during the campaigns on the Elbe and the Rhine, and the decided superiority they acquired over the enemy's cavalry in all outpost work and detached warfare.*"

SECTION II.—AUSTRIAN, PRUSSIAN, AND ENGLISH CAVALRY IN THE NAPOLEONIC WARS.

The Austrian cavalry, which at the outset of the revolutionary wars was superior to that of the French, soon lost its ascendency, and was often defeated by the cuirassiers of Napoleon. At Austerlitz, however, the Austrian horsemen, who covered the retreat of the allies, fought with the greatest gallantry to enable the retiring infantry to withdraw from the field.

In many a battle the Austrian cavalry showed the most distinguished bravery, and often rendered important services in covering the retreat of their beaten armies, as, for instance, at Eckmühl, Egolfsheim, and Ratisbon, of which the details are recorded in a former chapter. At Ratisbon forty squadrons of Austrian cuirassiers checked the whole French cavalry for more than three hours, and gave time to the army to recross the Danube.

The Prussian cavalry in the campaign of 1806, though well equipped and organised, were no match for the French horsemen, who, accustomed to victory, defeated them without difficulty at Jena and Auerstadt, and in the retreat followed them up, as we have seen, so closely and so vigorously that the Prussian army could not again appear in the field.

In 1813 and 1814 the allies had large bodies of cavalry, but a vicious habit had come into use of placing them in line of battle with the infantry, as was done by the French marshals at Blenheim and Ramilies. Napoleon, who used his artillery very freely against them, soon neutralised their influence, and so demoralised and discouraged them that his horsemen, although then newly raised recruits, were often able to defeat them.

At Lutzen the allies had immensely superior forces of cavalry, which they did not seem to know how to employ in action, for they remained almost idle spectators of a battle where the infantry were badly defeated. Napoleon, who knew the weakness of his own horsemen and the strength of his enemies in that arm, fully expected that it would be used vigorously against him, and made his preparations to meet it by moving up his infantry in large squares, supported by artillery, while he retained his cavalry in rear in reserve. The allied horse not being used, however, Napoleon won a victory.

After Leipzig the allied cavalry were in enormous numbers, amounting altogether to about 60,000, and should have effected greater results than they did in following up the retreat of Napoleon's beaten army. Tchernicheff, Orloff Denizoff, and the Cossacks harassed the French troops and cut off the stragglers; but there was no such pursuit as that of Murat after Jena.

Twenty squadrons of Prussian cavalry, under Colonel Dolfs, won a decisive success over General Maison's division of French troops on the 26th May, 1813, near Hanau. He attacked Maison, who had his men formed in eight squares, aided by eighteen guns, and in fifteen minutes had thoroughly defeated him, killing, wounding, or capturing the whole force with the exception of a small body of cavalry that escaped.[1]

The Prussian cavalry pursued the French army very vigorously after Waterloo, although 1,500 of them under Colonel Sohr, advancing incautiously, were surprised and captured at Rocquencourt, near Versailles, on the 1st July, 1815, in the last combat of the long and hardly contested wars of Napoleon.[2]

[1] Nolan, 55. [2] Humbert, 237.

The system of tactics among the European cavalry during this epoch was almost the same in all countries, the Cossacks alone being somewhat peculiar in their irregular method of fighting.

The English cavalry did well in the war in Spain, and maintained there the high reputation they had acquired in the campaigns in the Netherlands in 1793-94. At the battle of Salamanca the fate of the day was mainly decided by the gallant charge of the British cavalry of Le Marchant and Anson led by Sir Stapleton Cotton. The effect was instantaneous; in a few minutes the whole French left was thrown into confusion, 2,000 prisoners taken, five guns captured, and the broken remnants of the French divisions, thoroughly routed, were driven into a wood, and in a military point of view annihilated.[1]

Serving in the English army at this time was a force of Hanoverians and Germans, who were organised in a separate corps under the title of the King's German Legion. Attached to this Legion were two regiments of heavy dragoons, and three regiments of hussars. These horsemen acquired the highest reputation. The 1st regiment of hussars, commanded by Colonel Von Arentschildt, was admitted to be the best light cavalry corps in the army for outpost service, while the most brilliant cavalry charge in the Peninsular War was made by the heavy brigade of dragoons of the German Legion, under General Bock at Garcia Hernandez, the day after the battle of Salamanca. The particulars, which are contained in Beamish's history of the King's German Legion, are interesting and instructive.

"The French infantry and artillery being at first concealed by the inequalities of the ground, the brigades were ordered by Lord Wellington to attack the cavalry, and their pace was accordingly increased to a gallop. The German regiments, confined by the narrowness of the valley, had been unable during their progress through it to move upon a larger front than sections of threes, and now, being in echelon of squadrons, they attempted to form line upon the first squadrons without halting. Hurried forward, however, by the excitement of the moment, the leading squadron of the first regiment under Captain von Hattorf, having also in front General Bock, the field officers of the regiment, and Lieutenant-Colonel May of the English artillery, who brought the order from Lord Wellington, dashed on without waiting for the remaining squadrons, and made straight for the enemy's cavalry.

[1] Napier, Book 18, chap. iii.

"The left wing of the French horsemen retired from the charge of Anson's brigade, and those in front went about on the approach of Hattorf's squadron; but in the pursuit the flank of the squadron became exposed to the fire of the infantry on the heights, by which Colonel May and several men and horses were wounded, and the pursuit was discontinued.

"Captain Gustavus Von der Decken, who commanded the third or left squadron of the regiment, seeing that if he advanced according to the order given, his flank would be exposed to the fire of a dense infantry square, formed the daring resolution of attacking it with his single squadron.

"This square stood on the lower slope of the heights, and obedient to the signal of their chief, the German troopers advanced against it with order and determination, while a deafening peal of musketry from the enemy greeted their approach. Arrived within a hundred yards of the point of attack, the gallant squadron officer, struck by a ball in the knee, fell mortally wounded, and Lieutenant Von Voss, with several men and horses, were killed; but instantly Captain Von Uslar Gleichen, who commanded the left troop, dashing forward, placed himself at the head of the squadron, and reanimating his followers by word and example, while another shower of bullets carried destruction among their ranks, the intrepid soldiers forced onwards, and bringing up their right flank appeared before the enemy's bayonets on two sides of the square.

"The two front ranks, kneeling, presented a double row of deadly steel, while in rear of these the steady muskets of four standing ranks were levelled at the devoted horsemen. At this critical moment, when the sword was about to be matched against the firelock, and the chivalrous horseman against the firm foot-soldier, when victory hung yet in equal scales, an accidental shot from the kneeling ranks which, killing a horse, caused it and the rider to fall upon the bayonets, gave the triumph to the dragoons.

"For a path was now opened, and the impatient troopers rushing in amid the blazing fire while men and horses fell fast before the muskets of the French infantry, their firm formation was destroyed and the whole battalion were either cut down or taken prisoners.

"Captain Von Reitzenstein, who commanded the second squadron, seeing the success which had attended the daring onset of his comrades on the left, and being also impeded in his forward movement by the difficulties of the ground, decided upon following up the discomfiture of the infantry

and attempting the second square which stood on the edge of the heights. He was received with a steady and destructive fire by which Lieutenant Huegel was killed and Lieutenant Tappe severely wounded; but the moral force of the French infantry had been shaken by the fearful overthrow which they had just witnessed, and some timid individuals leaving their ranks, Reitzenstein rushed in with his heavy followers, the square broke, and the greater part of the battalion was cut down or captured.

"A third square was instantly formed by those few who had escaped from destruction, and some cavalry came to their support. Against these Captain Baron Marschalck led the third squadron of the second regiment, and being joined by the left troop of the second squadron, under Lieutenant Fumetty, charged and dispersed the enemy's cavalry, then riding boldly at the infantry, broke and completely overthrew them."[1]

This charge has received the highest praise from all quarters. General Foy, in his History of the Peninsular War, says expressly that it was the boldest and most gallant cavalry charge of the whole war in Spain. The Duke of Wellington in his reports said that he had never witnessed a more gallant attack.

Waterloo, the decisive and final battle of the wars arising out of the French Revolution, was the culminating triumph of the British army. In this action the English cavalry behaved with the most distinguished gallantry, as did also their brave opponents, the dragoons and cuirassiers of the French Emperor.

The action at Waterloo was commenced by a tremendous attack on the British centre and left, on both sides of the farm of La Haye Sainte, by a force of 20,000 men, under Ney and D'Erlon, in four massive columns, powerfully supported by artillery and cavalry. This enormous force, aided by the fire of seventy-four guns, moved on in perfect order and soon swept away the allied first line, which fled in confusion through the intervals of the second; but in that second line stood the fiery General Picton, the gallant old soldier who had led his troops to victory on so many fields, with two small brigades drawn up in a thin line only two deep. He had only 3,000 men, and the advancing columns in his front were four times his strength, but he firmly awaited the attack. The French approached closely and began to deploy. Picton seized the opportunity, poured in a deadly volley, and, with a fierce hurrah, the English soldiers dashed in with the

[1] Beamish, History of King's German Legion, ii. 81–84.

bayonet. The brave old soldier, while gallantly leading this charge sword in hand, was shot through the head and expired instantly. The French, however, recoiled in confusion, and then the English cavalry brigade, under Ponsonby, dashing through the openings of the infantry, burst upon the French columns with a fury that nothing could withstand. The whole mass was broken, dispersed, and routed, 2,000 prisoners and two eagles were taken in a few minutes, while the victorious horsemen, carried away with their success, and supported by Vandeleur's brigade on their left, charged the guns in rear, captured twenty-four pieces, cutting the traces and the throats of the horses and so rendering them useless for the remainder of the action.

Still pushing on, these English horsemen charged a third line of cannon and lancers, driving them back in utter rout. Napoleon, seeing the confusion, instantly ordered up Milhaud's cuirassiers from the second line, and these fresh horsemen, clad in steel, coming upon Ponsonby's broken and disordered squadrons, easily overthrew them with serious loss. Ponsonby was killed, and scarcely one-fifth of his men regained their lines.

This charge however, though disastrous to the English horsemen, was a great success when the results are considered, for besides destroying a column of 5,000, capturing 2,000 prisoners, and rendering useless for the remainder of the day as many as eighty pieces of cannon, it had checked a powerful and dangerous attack, and for the time restored the fortune of that portion of the field to the British army.

At the same time Napoleon pressed on the attack on La Haye Sainte, and soon carried it and moved on against Wellington's lines beyond it. Milhaud's cuirassiers charged and destroyed a Hanoverian battalion, when, being charged in turn by the English household cavalry, they were routed with great loss; but the English horsemen pressed on with reckless impetuosity, the reserves, carried away with enthusiasm, joined in the *mêlée*, and being charged by the French lancers while disordered by their success, were at once driven back in confusion to their lines. The 12th and 16th English regiments of cavalry now coming up charged the lancers in turn and drove them back to the foot of the valley.[1]

Napoleon then determined to make a desperate effort with his cuirassiers to break through the allied left and sweep it from the field. Wellington's dispositions to meet this attack were very skilfully conceived. He placed his infantry in squares, *en échiquier*, with the artillery in the intervals, and

[1] Beamish, 74.

so awaited the attack. The French opened with a tempest of shot and shell, to avoid which the English laid down. When the cavalry approached they rose and poured in volleys of musketry from the faces of the squares. The cannon in front of the lines were worked to the last moment by the British gunners, who sent a storm of grape and canister into the advancing horsemen and then took refuge in the squares. These cannon repeatedly fell into the hands of the cuirassiers, who valiantly charged over and over again in the hope of driving back the British lines. After every repulse, however, the gunners rushed out and poured the most destructive volleys into the retiring squadrons.

Nearly the whole of Napoleon's splendid cavalry was destroyed in these fruitless but gallant charges, on the allied left; and after the most desperate efforts, and repeated charges, they were obliged to fall back with diminished numbers and disordered ranks, a mere wreck of the brilliant squadrons that had formed up that morning in so imposing an array in the fields around La Belle Alliance. The injudicious use of all the cavalry of the reserve in the early part of this action, as well as the destruction of the Imperial Guard, were the great causes of the almost total destruction of the French army. A fresh reserve of cavalry, such as those brave horsemen who were left dead upon the slopes of Mount St. Jean, would have covered the retreat of the army and prevented a defeat being pushed into a disaster.

During these wars the English cavalry, like that of the other European nations, consisted of the Life Guards, the Dragoon Guards, or heavy dragoons, and the light dragoons and hussars. They were armed generally with swords, pistols, and carbines. There were no lancers in the English army until after Waterloo.

CHAPTER XXVI.

THE CAVALRY SERVICE FROM THE TIME OF NAPOLEON TO 1854.

DURING the period which elapsed between the close of the great wars of the Revolution and the introduction of rifled firearms, that is to say from Waterloo until the Crimean War, there were no great campaigns, and no marked improvements in the military art.

The most important conflicts of that period were the campaigns of 1828–1829, between Russia and Turkey, the Polish Insurrection of 1830–1831, the wars of the French in Algiers, and of the English in India. In the details of these campaigns we find but little change in the system of cavalry operations. There are, however, a few points that may be briefly touched upon.

A certain degree of activity in the organisation of the cavalry in Russia marked the early part of the reign of the Emperor Nicholas. There seem to have been two epochs in the reorganisation of the cavalry in this reign. Two dragoon divisions were changed into a hussar division and a lancer division, and the whole cavalry force was much diminished, the reduction being based on economical grounds. After the Polish war of 1831, the cavalry came to be more valued, and they were much increased, all the regiments being raised to eight squadrons, and reserves provided.[1]

In 1826 a war took place between Russia and Persia. The most important action was fought at Elizabethpol, where the Persians had a very large force of cavalry. The Persians drew up their army with the infantry in the centre, and great masses of cavalry on the flanks, and attempted to outflank and envelop the Russian wings. The Russian artillery fire checked their advance and compelled them to swerve from the direct attack. The stubborn resistance of the Russian army repelled the attacks of the cavalry on both

[1] Ivanhoff, 228, 229.

wings, while a gallant attack from the centre upon the line of Persian infantry pierced their ranks, and the victory was complete, the Russian cavalry pursuing vigorously and capturing many prisoners.

On the 29th of August, 1829, in the operations around Schumla, General Madatoff was sent with the 2nd brigade of the 3rd hussar division, the 1st Uhlan regiment, and six light guns, to reconnoitre in rear of the Turkish army, and to prevent them from bringing provisions to Schumla. He made a successful raid and captured ninety-seven men, fifty horses, a quantity of cattle, and 106 waggons with provisions.

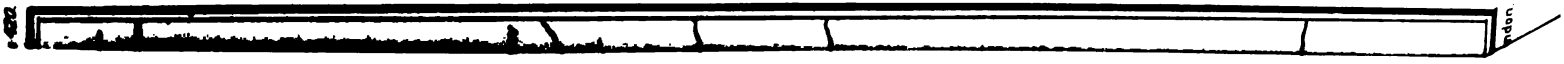
During the Polish war the separate detachments of Creutz and Rudiger were composed very largely of cavalry, the value of that service for moving rapidly from point to point, rendering it specially suitable for defeating detached parties of the enemy, and for preventing risings among a disaffected population. General Creutz's command in 1831 consisted of 9,043 infantry, 5,137 cavalry, including Cossacks, and 71 cannon, while in the command of General Rudiger at the same time, the proportion of cavalry was even greater, the numbers being, infantry, 6,686; cavalry (including Cossacks), 6,762; and 24 guns. The large number of cavalry in these commands caused them to be of great service.[1]

The Polish cavalry in this war were also very effective, and some very efficient cavalry leaders appeared in the ranks of the insurgents. At the battle of Dembe Velky, 31st March, 1831, General Skarzinski, with a brigade of cavalry, made a vigorous charge upon the centre of the Russian lines, which virtually decided the victory, nine pieces of cannon being taken, and a number of prisoners. In the pursuit which followed the victory, the cavalry also rendered effectual service.

Dvernitzky was one of the best Polish cavalry officers. In his expedition into Volhynia, in 1831, his force consisted of 2,700 cavalry, 1,300 infantry, and a few guns, but after fighting gallantly at Boreml, he was thrown back upon the Austrian frontier, where he was obliged to surrender to the Austrian troops.[2]

The most striking and interesting feature of the Polish war to the cavalry officer was the well-executed partisan campaign of the Polish General Dembinski, in July, 1831, in Lithuania. This affair was very similar in its character to the cavalry raids of the American Civil War, which we shall

[1] Okounef, Campaign of 1831. Appendix. [2] Soltyk, ii. 98.



hereafter have to consider at some length. It is of value to the cavalry officer, as an illustration of what is possible to a commander of horse who is possessed of a brave and indomitable spirit. In the beginning of July, 1831, the Polish army was at Kurszany, where it was decided to divide it into three bodies, one of which Dembinski agreed to lead back to Warsaw by a wide detour through the heart of Lithuania, which was swarming with Russian troops. The detachment consisted of 3,800 men, with six cannon. Dembinski left Kurszany on the 9th July, marched by Mieszkucie upon Poniewiez, and from there to Owanta, where his rear-guard had a hard fight with the pursuing column of General Sawoiny. When night came on he renewed his march to Podbrodzie, where his infantry-à-cheval galloped up and dismounted, and fought with great gallantry in seizing the position. From there he turned north, and marched for some distance to deceive his opponents, then turning sharp to the east he moved rapidly upon Daniszew, where he crossed the Wilia.[1] Skilfully eluding the various columns endeavouring to intercept him, he moved to Zboiska, when he crossed the Niemen, and then marched by way of Wola, Bielsk, and Nur, to Warsaw, which he reached on the 3rd August.[2] In this campaign Dembinski crossed one great river and six small ones, and moved with such rapidity, and deceived his pursuers with such skill, that he led his corps intact to Warsaw—a distance of 130 Polish miles, in twenty-five days. He seized large quantities of supplies, and considerable sums of money, and while on the march organised two of his guns as artillery-à-cheval. His forced marches were accomplished by an ingenious plan which he adopted of seizing a number of horses, and supplying each infantry battalion with fifty horses to carry the men who were most fatigued. He says he owed his safety principally to this system of resting his wearied foot-soldiers.[3] He also organised a force of mounted infantry by placing a number of them on horseback. This force was most useful to him, and saved delay in attacking small posts that lay in his way.

In India, during the last hundred years, the English have carried on a great number of wars, in most of which cavalry have been much used on both sides. The native forces in many of the states contained large masses of horsemen, the most noted probably being the Mahratta cavalry, which comprised a large force of the type common in the East. When Hyder Ali attacked the English in the Carnatic in 1780, his

[1] Soltyk, ii. 330 to 336. [2] Dembinski's Mémoires, 316. [3] Ibid 334.

army consisted of 28,000 cavalry, 15,000 regular infantry, besides a number of labourers, pioneers, &c. These horsemen charged in irregular bodies, but were unable to break the firm array of the British troops.[1]

The speed of the native armies always gave a great advantage over the English, who, after defeating them, could never pursue them with vigour on account of their great mobility. The operations of Lord Lake, in 1803 to 1806, are the first campaigns of interest to us, inasmuch as that officer fully appreciated the value of the horse, and utilised it very skilfully.

Lord Lake had been trained in his early boyhood in the wars of the great Frederick, and had seen the value of horsemen as trained and organised by that celebrated commander. Frederick had already invented horse-artillery. Lake adopted this idea, and attached two light six-pound guns to each regiment, worked by men selected from the ranks. These guns were also supplied with spare horses, so that nothing should delay their rapid movement, or prevent them being always able to keep up with the cavalry.

During the winter of 1802, and spring of 1803, this general carefully drilled and exercised his force, which consisted of three English dragoon regiments, and five regiments of auxiliary light cavalry, with sixteen guns, equipped and horsed, so as to be able to accompany the horsemen at speed. The result was that Lake had an effective force, which combined fire with rapidity of movement.

A force of this kind was necessary to meet the enemy which it was intended to encounter. The Mahrattas, as we have said, had in their armies large bodies of light horse of predatory instincts, who fought like the Parthians or Cossacks, and moving with a celerity far greater than that of the English troops, could attack unguarded points, and escape when beaten or pursued.

Holkar, who, after the defeat of the Scindiah and the Berar Rajah, in the battles of Assaye, Argoum, Delhi, and Laswarie, commenced operations against the English, had under his command over 60,000 light horse of the true Mahratta type, and about 130 guns.[2]

The campaign opened in 1804. At first the Mahratta chieftain was successful, for he defeated a combined movement made against him by Colonels Murray and Monson. On the approach of the main army, however, under Lord Lake, Holkar separated his army, sending the regular infantry and guns southwards, while he started himself,

[1] Dr. E. H. Nolan, History of British India, ii. 378. [2] Havelock, 129.

with his immense force of horsemen, on a raid towards the north.

Lake's measures were promptly taken. Leaving his own infantry and heavy guns, under General Fraser, to look after the enemy's foot-soldiers, he set out with six of the regiments of cavalry he had so carefully trained, with some horse artillery, and the "galloper" guns attached to the regiments, and one brigade of native infantry, which was carefully selected for its marching powers. The baggage was reduced to the lowest possible point, and every precaution taken to insure rapid movement.

With this force the chase began, and was continued day after day from the 31st October till the 16th November, Holkar keeping always twenty-five to thirty miles in advance. On the 16th November, when Lord Lake halted for the day, Holkar was thirty-six miles ahead, and the English commander concluded to surprise him by a night march. The surprise was complete, the English horsemen reaching the camp at daybreak. The Mahratta horses were fastened head and heels by ropes, the men sleeping wrapped up in blankets, when the artillery opened upon them, and the British light dragoons dashed through the camp with a rush, cutting the fugitives down in every direction. The plain was soon covered with dead bodies. Holkar escaped with difficulty.[1]

The pursuit was maintained over ten miles, making altogether including the march of the day before, and the night march, a distance of seventy miles passed over in twenty-four hours; an unparalleled effort when it is considered that it was done after the force had made a long and harassing march of 350 miles in about fifteen days.

Lord Lake's loss was only two dragoons killed and about twenty wounded, with seventy-five horses. The loss of the enemy was 3,000 killed on the field. This was a marvellous success of 3,500 men over 60,000, and may be attributed to a great extent to the skilful combination of speed with effective fire.

Another operation of like character was the pursuit of Ameer Khan by General Smith with the same force of cavalry which Lord Lake had placed under his orders. This time the cavalry marched over 700 miles in forty-three days, and only succeeded in bringing Ameer Khan to action once, on the 2nd March, 1805, at Zulgarh, at the very foot of the Himalayas. After a hard fight the English were completely victorious, but even then the horsemen of the enemy were able to escape in large numbers by their great speed.

[1] Havelock, 135.

On the 2nd April, 1805, Lake, by a night march, again surprised the remnants of Holkar's cavalry, and coming upon them suddenly before they could mount their horses, killed 1,000 of them, and pursued them over fifteen miles with a loss to his own force of less than twenty.

These are good instances of the value of organising and equipping cavalry to give them both the speed and the fire, to make them effective when called upon to act. The British troops found the want of a force of this type in the Mutiny of 1857, as they were always able to defeat the mutineers, but seldom able to catch them.

The French cavalry in Algiers had a great deal of experience in fighting against superior numbers of light horsemen, who, like the Mamelukes, were better fitted for single combat than for combined movements in masses. A number of battles were fought at different places, at Bouffaric in 1832, at Zig and Chiffa in 1835, at Tafna in 1835, and at Isly in 1844, in all of which the French were victorious. As these actions were very similar in their general features to the battles with the Mamelukes already described, we will not enter into any details.

PERIOD V.

FROM THE INTRODUCTION OF RIFLED FIREARMS TO THE PRESENT TIME.

CHAPTER XXVII.

INFLUENCE OF THE INTRODUCTION OF RIFLED FIREARMS.—THE CRIMEAN WAR.—THE WAR IN ITALY, 1859.

As far back as the 17th century the principle of the rifled barrel, and the increased precision of fire so to be obtained, was well known, but as the weapons were loaded from the muzzle, the bullets had to be forced with difficulty into the barrel, in order to cause them to fit into the grooves and so acquire the rotary motion. This rendered the process of loading troublesome and tedious, and quite unsuited for troops intended to fight in line of battle at close ranges.

Although the principle of the breech-loading weapon had been known long before (in fact it can be traced as far back as the year 1540)[1] the mechanical skill of the age was so defective that every attempt to utilise the idea failed, and so the only rifles were those loaded from the muzzle.

The American Revolutionary War, as we have seen, gave an increased use to these weapons, particularly in the hands of skirmishers, so that most armies had special corps of light infantry, armed with rifles and intended to act as *tirailleurs*.

The time had now come, however, when a new invention, which obviated the difficulty in loading, was about to cause the general use of the rifled firearm in all armies, and in every branch of the service. As far back as 1823, Captain John Norton, of the 34th Regiment of the English army, invented the cylindro-conoidal shot, which was the basis of all the modern improvements in small arms.[2] He was not en-

[1] Humbert, 320. [2] Beamish, 145.

couraged, however, in his efforts, and it was not until 1853 that the elongated bullet upon the same principle, which was invented by Captain Minié of the French service, began to be used in European armies.

This bullet, which expanded after loading, by the force of the explosion, and so took the shape of the grooves, at once did away with the difficulty of loading, and gave to the infantry a weapon which, to greatly increased range and power of penetration, added much greater precision in aim.

This was the second great blow that cavalry received through the introduction of gunpowder. In the first place the great power of penetration obtained by the use of firearms had soon caused the abolition of armour, and the revival of the infantry force. This second invention, which trebled the range and increased the accuracy of fire, could not fail to alter materially the relations between cavalry and infantry. This being soon followed by several effective and practical methods of loading at the breach, the rapidity of fire has been increased fourfold, so that a body of cavalry charging upon a force of infantry would now have to run the gauntlet of at least ten shots, well aimed, where in the time of Frederick the Great or Napoleon, one volley alone would be fired.

It cannot be denied that these important inventions must materially affect the tactics and employment of cavalry in modern wars, and it becomes important to consider carefully what changes should be made in the organisation, armament, and employment of cavalry, in order to meet the difficulties that are day by day gathering around it.

The best way to deal with the subject seems to be to trace closely the effect of rifled and breechloading weapons upon the mounted service, in those wars which have lately taken place, and upon the experience thereby gained, to base our suggestions as to the future armament and use of cavalry in war.

The first war in which the Minié rifle was used was that between Russia and the allied powers of Western Europe, in the Crimea, in 1854. In this war the operations were almost altogether confined to a protracted and closely-contested siege, and there were very few opportunities for testing the value of the cavalry as against the infantry. At the battle of the Alma, the allies had only about 1,000 cavalry, a force totally inadequate to compete with the much superior numbers of the Russian horse. There were consequently no charges of cavalry during the action, and even after it, Lord Raglan, the English commander, would not allow his

horsemen to follow up his success, from fear of having them cut to pieces by the Russian cavalry and artillery.

In the operations preceding the battle of the Alma, and subsequent to it in the flank march to Balaklava, the cavalry of both armies gave very little evidence of capacity for outpost and reconnoitring service. Forty years of peace had brought a new generation into the field, and though admirably drilled in manœuvring, the practical business of war was but little known.

So inefficient was the outpost service on both sides, that the English army in marching to Balaklava, on arriving at McKenzie's Farm, on the road from Sebastopol to Baktchi-Serai, fell upon the rear of the Russian army, as it marched across the high road. Lord Raglan, the British commander-in-chief, was surprised, and in great danger of being captured, while the Russians, equally taken unawares, believed they were attacked in force, and withdrew rapidly. The English cavalry, under Lord Lucan, had blundered off on the wrong road, and in strict adherence to the rules laid down in the drill books, were marching on one road, strung out in an advance guard formation, leaving the other roads, and the whole country around the line of march, unwatched and unexplored.[1] So defective was the outpost service, that two large armies, with their baggage, crossed each other's path, and actually at one point came into contact without discovering each other's designs, and without the cavalry coming together. This one fact speaks volumes as to the inexperience of the cavalry officers on both sides, in a most important sphere of their duty.

There were no further cavalry operations after this flank march, until the 25th of October, 1854, when the battle of Balaklava took place, in which the main portion of the fighting was done by the cavalry. In the early morning the Russian army, under General Liprandi, moved upon the allied position near Balaklava, in the hope of driving the allied troops out of that important point, which served as the base of operations for the English army in the Crimea.

Outpost duty was still but little understood in the allied army, and a monotonous repetition of the formula, "Halt! who goes there?" "Rounds." "What Rounds?" "Visiting Rounds." "Visiting Rounds, advance! all's well," had not yet taught them the practical duty of advanced posts. As Kinglake well says, "When these words have been reiterated by the same men a few thousand times, they are as lulling as the monotone waves that beat and still beat on the shore."

[1] Kinglake's Invasion of the Crimea, ii. 77, 79, 80.

"A man's wits may easily be deadened, they can hardly be sharpened by formula."[1]

The result was that the field officer of the day notified the pickets of the advance of the enemy and saved them from capture, a warning that should have first come from themselves. This incident shows the great difficulty of having this duty efficiently performed, and the importance of thorough training in this branch of the profession of arms.

The Russians came suddenly upon the line of advanced redoubts, storming them in succession, and killing the Turkish garrisons which held them, and then pressed on towards Balaklava. A large force of cavalry, consisting of some thousands in number, covered the advance, and four squadrons moving towards Kadikoi, were met by Sir Colin Campbell, with the 93rd Highlanders, who fired upon them while deployed in line only two deep. This caused the Russian horse to swerve to their left, and fall back to their lines.

This action has been much talked of, particularly by English writers, as a great triumph of infantry over cavalry, but it really teaches nothing. An English officer of cavalry of great reputation, who was present on the occasion, expressed his opinion positively to the writer, that the Russian squadrons had no intention whatever of charging, but were simply at the time making demonstrations to oblige the allied troops to display their arrangements, and that when the 93rd showed their line upon the hill, the object was gained, and the cavalry withdrew. Sir Colin Campbell, who was an experienced soldier, knew exactly what the horsemen were doing, and made his arrangements accordingly. He approved of the skill displayed by the Russian commander, for, turning to his aide-de-camp, he said, "Shadwell, that man understands his business."[2]

Shortly after this affair, General Scarlett, with a portion of the English heavy cavalry brigade, in moving across into the South Valley, suddenly discovered a great mass of the Russian cavalry, on a rising ground on his flank, apparently moving straight down upon him. The Russian column halted for a moment on seeing the troops in front of them. Scarlett did not hesitate an instant, but wheeling into line to the left led an impetuous charge straight at the centre of the opposing column. This charge, delivered at full speed upon a force at the halt was necessarily successful, especially as the Russian supports had moved on so far as to be virtually closed upon the front line, and so to have lost their value as supports. Scarlett was promptly and vigorously aided by charges that

[1] Kinglake's Invasion of the Crimea, ii. 407. [2] Ibid. 425.

were made by the other squadrons of his brigade upon both flanks of the Russian horsemen at the crisis of the fight.

The result was that the Russians were obliged to withdraw, their retreat being safely effected, and without being followed by the English horsemen. The conduct of Lord Cardigan, who, with the Light Brigade under his orders, was an idle spectator of the fight, in neglecting to charge upon the flank of the opposing horsemen, was very faulty, and an evidence of the depressing effect of the routine and regularity of a lifetime of peace service.

About an hour or two after this fight, the celebrated charge of "The Six Hundred" took place. It arose through a misunderstanding of the order directing the advance, and consequently Lord Cardigan led an attack for a mile and a quarter down an open valley, where his troops were exposed to the fire of artillery and riflemen in front, and on both flanks for the whole distance. The charge was most gallantly made, the whole force displaying the most astounding bravery, but it was all in vain. The fire of cannon and small arms almost destroyed the brigade, 195 men only returning from the disastrous ride.

This action teaches little to the cavalry officer, and is only to be noted on account of the dashing and gallant manner in which these English horsemen obeyed their orders, and rushed on to what seemed certain death.

To cover their retreat, the French 4th Chasseurs d'Afrique, under General D'Allonville, charged some Russian artillery on the Fedoukine hills. This charge was made in the scattered formation called "en fourageurs," and was successful in forcing the withdrawal of some Russian batteries, which had been firing upon the English horsemen. The charge was well timed, and conducted with boldness and skill.

The losses of the Light Brigade are said to have been considerably augmented by the fire of riflemen who were posted upon the range of hills which skirted the North Valley. This was the only instance of the use of the rifle in this affair. Here, however, we first see in European warfare the revolving pistol, a weapon as deadly in its character as anything ever invented. Many of the English officers had provided themselves with these pistols, and, in the charge of "the Six Hundred," used them with effect, particularly when retreating in disorder after the attack.

The late Colonel Jenyns, C.B., of the 13th Hussars of the English army, was a captain in the regiment at Balaklava. He was making his way back during the retreat to the

English lines, on a horse which was mortally wounded, when he was intercepted by three Russian cavalry, an officer and two men. His horse was so weak from loss of blood that he could not use his sword, so he drew his revolver and held the whole three at bay for a time. At length the officer made a dash in upon him with his sabre, but the colonel shot him before he came within reach of him. The other two molested him no further, and he reached the lines safely. Many instances of the use of the revolver are mentioned in connection with this war.

In the battle of Bash Kadiklar, fought on the 19th November, 1853, between the Russian army under Prince Bebutoff, and the Turks under Reyss Achmet Pacha, a gallant charge was made by the dragoons and the line Cossacks, from the flank of the Russian army, against the Turkish right. The charge was completely successful. The Turkish squares were broken, their whole right flank and part of the centre overturned, twenty cannon captured, and the victory decided. On the Russian right flank, Prince Chavchavadzy, with three divisions of Nijagorodskoy dragoons, 100 militia cavalry, and four guns, held in check 5,000 Bashi Bazouks and Kourds during the whole action, and near the close of it in a gallant fight, defeated a regiment of Turkish cavalry, supported by eight guns and eight battalions of infantry, and drove the whole force off the field with the loss of two cannon.[1]

At the battle of Karook Dara, in Asia Minor, on the 24th July, 1854, the Russian Tverskoy dragoon regiment, under the command of Major-General Count Nerode II., and Colonel Kookolevsky, attacked a Turkish battery with great steadiness, under the heaviest fire in front and flank. Having overthrown the enemy's horsemen, they captured the guns and carried off four of them. Immediately after this another charge was made by the Nijagorodskoy dragoons under Prince Chavchavadzy, in which several Turkish squares were broken and one battalion cut to pieces, the dragoons suffering heavily; out of thirty-three officers there were killed and wounded twenty-three, half the soldiers being also placed *hors de combat.*

The Nijagorodskoy dragoons, in a subsequent charge, recaptured two guns that had been lost, and took four from the Turks.[2]

Shortly after the Crimean War, in the war between Great Britain and Persia, in 1857, a splendid cavalry charge was

[1] Bogdanovitch, The War in the East, vol. i. 247, 248.
[2] Ibid. vol. ii. 188, 189, 190.

made by the 3rd Bombay light cavalry, upon a Persian square containing 500 men, well formed, and ready to receive the attack. Adjutant Moore, of the 3rd light cavalry, was the first into the square. He let his sword hang by the sword-knot, and taking a rein in each hand, jumped his horse on to the bayonets. The horse was killed, but the square was broken and annihilated, while Moore was not even wounded.

In the Italian campaign of 1859, the cavalry did not play any important part, chiefly, it is said, on account of the difficult nature of the ground, it being cut up with vineyards, trees, and ditches. At Magenta some charges of cavalry were made, in small numbers, on both sides, in which the French claim successes. At Solferino several cavalry charges were made, on a larger scale, by both the Austrians and the French, on the plains around Medole. The fighting was almost altogether between the rival forces of horse, and swayed alternately in favour of either side, as fresh reserves were poured in ; the general result being in favour of the French. General Desvaux captured 600 Austrian infantry in one of his charges, while the Chasseurs d'Afrique are said to have broken one square which had not quite completed its formation.

In fact, in this campaign the cavalry did not perform very important services. It seemed as if there was a fear which prevented them being launched in large masses against portions of the enemy's line, and probably the knowledge on both sides, of the deadly effect of the long-range rifle, prevented the horsemen from being sent against bodies of infantry armed with the new weapons.

At Montebello, Colonel Morelli, commandant of the regiment of Montferrat, at the head of twenty-two Piedmontese lancers, charged a square of Austrian infantry. They broke through the square, but eleven were killed and the others all wounded. Colonel Morelli charged three times after receiving a mortal wound.

The deadly effect of the new rifles, on account of their long range, at once created a sort of panic in reference to the cavalry service, and the professional soldiers, fully appreciating the great effect the new invention must have upon the mounted service, at once held that their sphere of usefulness was much diminished, and the opinion soon became general that the days of the cavalry were numbered, and that the force would have to be either abolished altogether, or else greatly reduced.

The reader can hardly have followed us through the preceding pages of this work, without being struck with the

peculiar way in which ideas have arisen and have been carried to excess, and how opinions have swayed at one time in favour of cavalry, at another time in favour of the infantry, and how often these opinions have been carried to extremes.

At this period it seemed as if the feeling against cavalry was to be carried blindly to the last extremity, but as in the case when the chivalry first felt the influence of the rising power of the infantry, as represented by the Swiss pikemen and the English archers, as when the introduction of gunpowder struck another blow at their predominant position, the vested interests, the professional prejudices, the *esprit du corps* of the knights, long upheld the cavalry service; so the same feelings again came to rescue the force from being abolished. The pride, the *esprit du corps*, and the influence of the cavalry service, were all aroused in its favour, and the point vehemently maintained that, although cavalry might not be used in exactly the same method as formerly, nevertheless its day was not past, and there was still a vast field of usefulness before it.

It could not be denied that the limits to the action of cavalry upon the battle-field had been much narrowed, and that the opportunities of making successful charges would be much less frequent, while the losses to horsemen if checked in an attack would be greatly increased. This led to many changes being made in European armies.

In Russia, important modifications were made in the army in 1856. The cuirassiers of the line were abolished, as well as some regiments of dragoons, and fourteen other regiments, of cavalry, more lightly equipped, substituted in their place. The abolition of the cuirass was evidently the result of the increased power of penetration of the Minié rifle, which rendered such defences almost useless against infantry fire.

In Austria also, after the war of 1859, the cavalry were much reduced. At that time, the cavalry consisted of eight regiments of cuirassiers, eight of dragoons, twelve regiments of Uhlans, and twelve of hussars. The heavy cavalry had six squadrons in each regiment, the light cavalry eight, with the exception of the sixth and eleventh regiments of Uhlans, which had only four squadrons each. In addition to these, were two regiments of volunteer hussars, of four squadrons each, making an aggregate of 96 squadrons of heavy, and 192 of light cavalry.[1]

In March 1860 the cavalry were diminished, the heavy by two regiments, the dragoons were suppressed with the excep-

[1] Renard, 33.

tion of the fifth and seventh regiments, and the first, second, third, and sixth, which were changed into cuirassiers. The light cavalry were reduced at the same time to the extent of twenty-four squadrons. According to General Renard, the cuirassiers, though still retaining the name, had abandoned the use of the cuirass.

In Prussia, on the contrary, the cavalry, which before the Italian war amounted to eighty squadrons of heavy and seventy-two squadrons of light cavalry, was increased to 100 squadrons of each. This was done to make up for the cavalry of the Landwehr, which in the future was to be retained for a reserve, and was not to be marched to the frontiers with the first army.

CHAPTER XXVIII.

THE AMERICAN CIVIL WAR, 1861—1865.

AT this period, before rifled firearms had been fairly and thoroughly tested, a great civil war broke out in the United States of America, in which the Southern, or slave-holding states, endeavoured to separate themselves from the Northern and Western States, and establish an independent republic, free from the control of the Union. This war, which was most hotly contested, was carried on with great determination on both sides for over four years, the theatre of war extending almost across a continent, and the numbers engaged reaching an enormous figure.

The details of this conflict are very interesting and instructive, for the circumstances under which the war broke out, and the manner in which it was carried on, were peculiar to the continent. From 1812 until 1861 the United States had only had but few wars, the Mexican campaigns being the most important, the others being merely frontier conflicts against the Indians of the plains.

The standing army was consequently very weak in numbers, and not sufficient to have impressed upon the people the rigid rules and prejudices of the professional soldier. The newness of the country, the struggle that the whole population, for one or two generations, had been carrying on in striving to carve out homes for themselves in the wilderness, the experience gained in clearing up homesteads, while surrounded by wild beasts, by hostile Indians, and lawless adventurers, had all a marked effect in forming the character of the people.

The rifle in the frontier districts was as necessary an implement as the axe. Everyone almost understood its use, and great numbers were distinguished for the unerring skill with which they could strike their aim. The English regular armies in the Revolutionary war felt the terrible efficiency of

the American irregular troops in the use of these weapons. In the war of 1812 the Canadian volunteers, men of the same type, brought up under the same influences, surrounded by the same dangers and trials, but hardier and more enduring from their more healthy and rugged climate, enabled the English regular troops with their assistance to meet boldly, and often to defeat, the American armies.

One of the most remarkable instances of the capacity of the Canadian militia in that kind of warfare was the battle of Chateauguay in 1813. In this action some four hundred Canadians, with their axes and their rifles, posted themselves across the path of an American army of some 7,000 men, under the command of General Hampton. Skilful axemen, deadly shots with their rifles, these Canadians used both weapons, and slashing down long lines of trees in the form of abattis, they impeded the march of the American column, while with their rifles they poured in well-directed volleys upon the front and flanks of their enemy. The Americans, entangled in the forest, unable to penetrate the masses of fallen timber which surrounded them, and suffering from the dropping fire of small arms, withdrew in haste, followed and harassed by the victorious Canadians. Every invasion of Canada was defeated by the bravery and determination of the Canadian people, and when the war ended the United States did not hold one inch of Canada, while British troops held a large portion of the State of Michigan.

The traditions of this war and the frontier fights with the Indians had given to the people of the United States a high opinion of firearms. They had already adopted the idea of mounted riflemen in 1812, having organised a regiment of Kentucky frontiersmen, who were all mounted and armed with rifles and pistols. The only real victory won by the American troops in an open action in that war was directly attributable to the services of these mounted riflemen. It was the battle of Moravian Town, in Western Canada, on the 5th October, 1813. Colonel Johnson, who commanded the Kentuckians, charged upon the British infantry, broke them, and captured a number of prisoners. He then turned to his left and attempted to charge a large force of Indians, who were stationed in the edge of a growth of timber, but he found that the ground was swampy and that his horses began to sink. Seeing this he ordered his men to dismount and make the attack on foot. Tecumseth, the Indian chief, was killed and his braves defeated. One cannot imagine a more striking example of the advantage of a mounted rifle corps equipped

to fight on foot in case of need; this regiment fought in two capacities in about as many minutes.

The Colt's revolver had also been invented in America prior to the year 1838, and attempts were made by Colonel Colt to have it introduced into the army during the Seminole war in Florida. An army board, appointed to report upon it, was not favourable to its adoption; and a large number of the pistols, being sold at cheap rates, gradually got over into the hands of the Texans, who were then engaged in a predatory war with the Comanche Indians.

These revolvers soon acquired a high reputation, and in the Mexican war were eagerly sought after, and high prices paid for them. A regiment of Texan mounted rangers, armed with these weapons, was attached to the American army during the Mexican war, and at once demonstrated the value of the pistol in a hand-to-hand fight with cavalry. In every encounter the revolver proved its deadly effect, and soon a cry was raised for the resumption of their manufacture. They therefore soon became plentiful, and in all the frontier states most men were supplied with them, and were very skilful in their use.

The lawlessness and want of order in the new settlements, where every man carried his life in his hands, rendered the custom of carrying revolvers or bowie knives almost universal.

The exigencies of a new country, the absolute want of regularity and order, the necessity of adapting and arranging everything to suit circumstances, the continual habit of contriving and inventing methods of meeting difficulties of the most varied and complicated character, which were continually arising in the bush, had the natural result of making the American people use the power of reason to the highest possible extent. This developed their inventive faculties to the utmost, and it has resulted in producing the shrewdest and most self-reliant people in the world. The power of invention of the native Yankee is proverbial.

Such was the population, such the state of their arms, and such their ideas of weapons when the war broke out, and the regular army was swamped and lost in the vast hordes of volunteers who thronged to the standards of the two rival powers. It will be interesting to follow the course of this war, and see how their shrewd practical common sense and the absence of prejudice and red tape led them to adopt a system of tactics, somewhat new and peculiar to themselves, but still wonderfully well adapted to their circumstances and to the state of the art of war at the time.

The training and customs of the people had a great effect upon the results of the war, and the difference in the quality of the troops raised in various portions of the country was soon perceived in a very marked degree.

The New Englanders were a manufacturing people, and the troops from the North-eastern States were mainly recruited from the manufacturing classes. The Southerners, on the contrary, were almost all agriculturists and well accustomed to the use of weapons; while the North-Western States furnished a hardy class of frontiersmen and farmers to the armies of the Union.

The Southerners were soldiers of the best quality, but were greatly outnumbered. In the Department of the East, that is to say in Virginia, where they were opposed by troops raised in the manufacturing districts and large cities of the New England States, their marked superiority soon showed itself, and in all the battles of the war in that part of the continent the ascendant of the army of Northern Virginia was plainly manifest.

In the western theatre of the war the Federal armies were more successful. The hardy western settlers greatly outnumbering the Southerners in the valley of the Mississippi, and equally good material for soldiers, won the first success of importance in the capture of Fort Donelson, and from that time the Federal troops slowly but surely moved on to the conquest of all that portion of the confederacy, being vigorously opposed by the Southern troops, who hotly contested every foot of their progress.

The war opened very slowly, as both sides were totally unprepared for hostilities, and armies had to be raised, organised, armed, and drilled before operations in the field could be commenced. At the outset the cavalry was organised in very small numbers indeed. In the first great battle, that of Bull's Run, on the 21st July, 1861, the Federal army, consisting of some 40,000 men, had only seven companies of cavalry, hardly one small regiment, while on the Southern side the proportion was not much greater. These shrewd people, who at the opening of the war, acted upon the ideas, at that time very prevalent, of the uselessness of cavalry as against the new infantry firearms, soon discovered their mistake, and the mounted service increased rapidly, so much so that in the latter part of the war the Northern State, maintained no less than 80,000 cavalry, almost all mounted riflemen.

In Virginia the war was from the outset conducted with more science and skill than in the valley of the Mississippi,

Generals Lee, Joseph E. Johnston, "Stonewall" Jackson, and their lieutenants, being all officers of the very highest ability and training. In the west, on the contrary, the war partook more of the character of partisan operations for the first two years, and during this period the corps of mounted riflemen began to acquire a great reputation.

Major-General John H. Morgan, a Kentuckian, who had no professional training as a soldier, is said to have been the first to see the value of a force of mounted riflemen, and to put into use a new system of working cavalry so as to give to it the benefits of the improvements in firearms.

The knights of old, when first staggered by the invention of gunpowder, which gave to the infantry so great an advantage over them, determined to apply the new weapon to their own use, and adopted the petronel and heavier armour, and so for a time retained their superiority over the infantry.

The same idea struck Morgan, and he at once saw that the long-range weapon gave the dragoon or mounted rifleman a great advantage, which he did not have with the old uncertain and short-range carbine. He organised a force of cavalry therefore which could move rapidly, and fight either on foot or mounted as occasion might require.

Another reason led to the introduction of mounted riflemen that will seem strange to the European reader, particularly to the European cavalry officer. There is no principle more firmly established among the professional writers on cavalry tactics than that the sword is the most deadly and effective weapon that can be placed in the hands of a horseman. The moral effect of horsemen charging sword in hand is very great in all European armies; and no principle is laid down more positively than the maxim that cavalry relying on firearms must certainly be beaten.

In America, strange to say, the exact reverse is the fact. There the people had the greatest contempt for the sword, their small force of regular cavalry trained upon the European plan, alone placing implicit confidence in it. The habit of the individual citizen of being often armed with a revolver, and having almost always a rifle of his own, as well as the wonderful skill acquired in their use, gave them naturally a high opinion of their favourite weapons. At once a feeling of contempt for the sword sprang up in the Southern armies, and although at the outset of the war the Northern cavalry, and particularly the regulars, used the sabre, the Southern troops, both mounted and dismounted, so despised the weapon that nothing could make them give way to a charge of cavalry sabre in hand.

A distinguished Southern general told the writer that this contempt of the Southern infantry for the sword was marvellous. He said he had seen lines of skirmishers and lines of battle of infantry charged by Northern regular cavalry, and when his men would see them coming the cry would be raised along the line, "Here, boys, are those fools coming again with their sabres; give it to them!" and they would laugh and joke at the idea as if it were the extremity of folly.

The writer has often heard officers of General Morgan's command speaking the same way. In referring to actions with bodies of Federal cavalry they would say: "They charged down upon us with their sabres, but when we saw that we knew we had the fight all in our own hands, for it was simply silly for them to think they could do anything with us in that way."

So strong was this feeling in the west at the outset of the war, that the hastily raised and imperfectly equipped Southern cavalry, armed as they often were at first simply with double-barrelled fowling-pieces loaded with slugs, would charge at speed at a line of hostile cavalry, firing both barrels into the enemy's faces, and would then dash through, striking with the butts of their guns.

With this type of soldier to recruit from, and under these circumstances, Major-General John H. Morgan revived and improved the principle of the dragoon organisation, and applied it successfully to the fullest extent.

General Basil W. Duke, in his "History of Morgan's Cavalry," says: "Whatever merit may be allowed or denied General Morgan, he is beyond all question entitled to the credit of having discovered uses for cavalry, or rather mounted infantry, to which that arm was never applied before. While other cavalry officers were adhering to the traditions of former wars, and the systems of the schools, however inapplicable to the demands of their day and the nature of the struggle, he originated and perfected not only a system of tactics, a method of fighting and handling men in the presence of the enemy, but also a strategy as effective as it was novel.

"Totally ignorant of the art of war as learned from the books and in the academies, an imitator in nothing, self-taught in all that he knew and did, his success is not more marked than his genius.

"The creator and organiser of his own little army, which at no time reached 4,000, he *killed and wounded* nearly as many of the enemy, and captured more than 15,000. The

author of the far-reaching 'raid,' so different from the mere cavalry dash, he accomplished with his handful of men results which would otherwise have required armies, and the costly preparations of regular and extensive campaigns."

Morgan's men were armed in a very nondescript manner at first, but as the war went on he captured such quantities of arms from the enemy as enabled him to supply his men fully with rifles and pistols. At first some had rifles, some shotguns, some sabres, some revolvers, but they were soon supplied with carbines or rifles and revolvers, and the sabre was rarely, if ever, used.

Morgan's troops were drilled upon "Maury's Skirmish Tactics for Cavalry," to which Morgan himself added a great many movements so as to provide for the evolutions of regiments and brigades. The formation of the companies, the system of counting off, of dismounting, of deploying to front flanks or rear, was the same as in the regular cavalry, and his force was also carefully trained in all the movements necessary to change from line into column, from column to line, to take ground in different directions, and to provide for the employment of supports and reserves, &c.

General Duke's description of the method of fighting adopted by General Morgan will be interesting to the cavalry officer.

"If the reader will only imagine a regiment drawn up in single rank, the flank companies skirmishing, sometimes on horseback, and then thrown out as skirmishers on foot, and so deployed as to cover the whole front of the regiment, the rest of the men dismounted (one out of each set of four, and the corporals remaining to hold the horses), and deployed as circumstances required, and the command indicated to the front of, on either flank, or to the rear of the line of horses, the files two yards apart, and then imagine this line moved forward at a double quick, or oftener a half run, he will have an idea of Morgan's style of fighting.

"Exactly the same evolutions were applicable for horseback or foot fighting, but the latter method was much oftener practised—we were in fact not cavalry, but mounted riflemen. A small body of mounted men was usually kept in reserve to act on the flanks, cover a retreat or press a victory, but otherwise our men fought very little on horseback, except on scouting expeditions. Our men were all admirable riders, trained from childhood to manage the wildest horses with perfect ease, but the nature of the ground on which we generally fought, covered with dense woods, or crossed by high fences, and the impossibility of devoting sufficient time

to the training of the horses, rendered the employment of large bodies of mounted men to any good purpose very difficult. It was very easy to charge down a road in column of fours, but very hard to charge across the country in extended line and keep any sort of formation. Then we never used sabres, and long guns were not exactly the weapons for cavalry evolutions. We found the method of fighting on foot more effective; we could manœuvre with more certainty and sustain less and inflict more loss. 'The long flexible line curving forward at each extremity,' as an excellent writer described it, was very hard to break; if forced back at one point, a withering fire from every other would be poured in upon the assailant. It admitted, too, of such facility of manœuvring; it could be thrown about like a rope, and by simply facing to the right or left, and double-quicking in the same direction, every man could be quickly concentrated at any point where it was desirable to mass them.

"It must be remembered that Morgan very rarely fought with the army; he had to make his command a self-sustaining one. If repulsed he could not fall back and re-form behind the infantry. He had to fight infantry, cavalry, artillery; take towns when every house was a garrison, and attack fortifications with nothing to depend on but his own immediate command. He was obliged, therefore, to adopt a method which enabled him to do a great deal in a short time, and to keep his men always in hand whether successful or repulsed. With his support from four to five hundred miles distant, an officer had better learn to rely on himself."

In reference to the armament of Morgan's command, the weapon that was always preferred by both officers and men was the medium Enfield—but, as in many of the other Southern partisan corps, the men were at first armed with what they could get. The consequence was that when Morgan's regiment was organised, one company was armed with the long Enfield, another with the medium, and a third with the short Enfield—a fourth had Mississippi rifles, a fifth shot guns or fowling-pieces, while the sixth company carried a species of Enfield carbine. Nearly every man had a revolver, some two; when they had captured sufficient, each man was provided with a pair The pistol best liked and most used was the army Colt revolver.[1]

In addition to the mounted riflemen Morgan had two mountain howitzers that could be drawn by two horses each, over almost any kind of ground. These cannon were of the greatest service, and the men became much attached to them.

[1] History of Morgan's Cavalry, 178.

They called them affectionately the "bull pups," and cheered them loudly whenever they were being taken into action.[1]

Such was the armament and method of fighting of Morgan's cavalry, and a few words upon the feats performed by these horsemen will tend to prove how effective they were in the peculiar circumstances in which they were placed.

Morgan was said to be the author of the far-reaching raid. It was probably an original idea with him, for it is extremely likely that he had never heard of the operations of Tchernicheff, Tettenborn, and other partisan leaders, in the rear of the French army in 1813. His "raids," however, were upon almost the same principle as those of Tchernicheff, or that of Dembinski, except that he used no infantry and did have two guns.

His first important raid was made into Kentucky in 1862. He started from Knoxville, Tennessee, on the 4th July, and moved through Sparta and Glasgow to Lebanon, where large supplies of stores of every kind were captured. From Lebanon Morgan marched to Harrodsburg, from there on to Lawrenceburg, and then to Midway, a station on the railroad between Frankfort and Lexington. This latter place was the headquarters of the Federal forces in that region, and both at that point and at Frankfort were large bodies of Federal troops, much superior to the force which Morgan had under his command.

By skilful marches, by scattering his forces and threatening several points at once, the Federal officers were entirely bewildered, and did not know where to expect a blow. The extreme mobility of his flying column also rendered it difficult to obtain any correct information as to Morgan's force or his intentions. The marching capacity of the column may be judged from the fact that at the time it reached Midway it had marched over 300 miles in eight days, and the men were still fresh and in high spirits.

At Midway, with greatly superior forces on each side of him, the most extraordinary use was made of the telegraph by a Canadian named Ellsworth, who was a most skilful telegraph operator attached to Morgan's staff. By "tapping" the wires he interfered with the arrangements of the Federal generals, sending their troops in wrong directions by forged orders which he despatched in place of those he intercepted.

This raid was very successful, and the results may be best summed up in the words of General Morgan's Report. "I left Knoxville on the 4th day of this month, with about 900 men, and returned to Livingston on the 28th instant with

[1] History of Morgan's Cavalry, 179.

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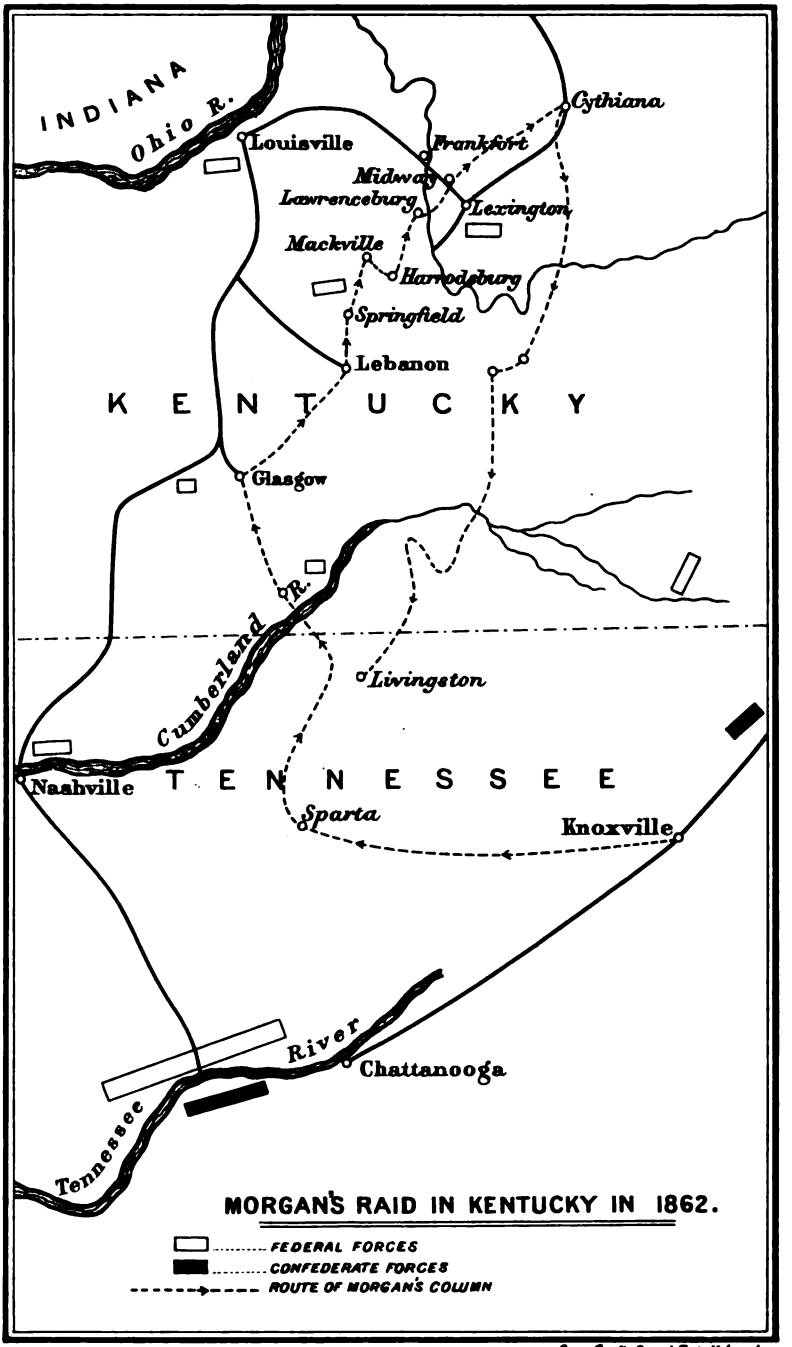

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nearly 1,200, having been absent just twenty-four days, during which time I have travelled over 1,000 miles, captured seventeen towns, destroyed all the government supplies and arms in them, dispersed 1,500 home guards, and paroled nearly 1,200 regular troops. I lost in killed, wounded, and missing of the number that I carried into Kentucky about ninety."[1]

General Buell's army was obliged to fall back to Louisville in August, 1862, in consequence of a second raid made by Morgan's corps, in which he took possession of the Louisville and Nashville Railroad, in Buell's rear, at Gallatin, and so cut off his communications with his base.[2]

At the Battle of Hartsville, shortly after the capture of Gallatin, a fight took place between a portion of Morgan's command and some Federal cavalry who charged them with the sabre; the account of it gives a good idea of Morgan's style of fighting. General Duke describes the attack. "Throwing down the eastern fence of the meadow, some 300 poured into it, formed a long line, and dashed across it with sabres drawn, toward the line of horses which they saw in the road beyond. Companies B, C, E, and F were by this time dismounted, and had dropped on their knees behind a low fence on the road side, as the enemy came rushing on. They held their fire until the enemy were within thirty yards, when they opened. Then was seen the effect of a volley from that long thin line which looked so easy to break and yet whose fire was so deadly. Every man had elbow-room and took dead aim at an individual foe, and, as the blaze left the guns, two-thirds of the riders and horses seemed to go down. The cavalry was at once broken and recoiled. Our men sprang over the fence, and ran close up to them, as they endeavoured to retreat rapidly through the gaps in the fence by which they had entered, and poured in such another volley that the rout was completed. However they re-formed and came back, but only to be repulsed again."

They were then pursued by the mounted men, who followed them for some three miles, when Johnson rallied in a strong position on a hill, dismounted his men, and formed them up to check the pursuit. The pursuers followed up swiftly, and seeing the disposition made by the enemy, rapidly formed up, dismounted under cover of a hill, charged and carried the position on foot.

The Federal force on this occasion was carefully picked, and composed of the best cavalry in the Federal army, and placed under General Johnson, who was selected as their best

[1] Duke, 205. [2] Ibid. 214.

and most dashing cavalry officer, and sent out specially to destroy Morgan's command. It will be seen that Johnson relied on the sabre. He was totally defeated, and he himself and a large body of his men captured. General Duke bears testimony to the great gallantry displayed by both officers and men of the Federal force, and after referring to their attempt to use their sabres, he says General Johnson "was evidently a fine officer, but seemed not to comprehend 'the new style of cavalry' at all."

This contempt for the sword is very peculiar. Instances can be found without number of cavalry who would rather themselves rely upon their firearms than their sabres, but there is no war recorded in history in which the charge, sword in hand, at speed, did not exert a great moral influence upon the enemy until we reach the novel experiences of the American Civil War.

In July, 1863, General Morgan made his boldest and most extensive raid through Kentucky and Indiana, and but for a sudden and totally unexpected swelling of the Ohio river, which rendered all the fords impassable, he would have been entirely successful. After doing great damage in the enemy's rear, he was at last cut off on the banks of the Ohio, and captured with a great portion of his command. On this raid Morgan moved with great rapidity. He marched from Summansville, Indiana, to Williamsburg, east of Cincinnati, a distance of more than ninety miles, in thirty-five hours. This was the greatest march he ever made.

The above particulars will give a good idea of the style of fighting adopted by Morgan, and of the general result of the system. He was the first of the Southern officers to set the example of making extensive raids in the enemy's rear, but it was not long before the example was followed by other officers in both armies.

In the army of Northern Virginia, the Southern cavalry, under General J. E. B. Stuart, performed valuable service, and displayed a gallant and dashing spirit. Under this brilliant commander the Confederate horsemen on two occasions made raids around the whole position of the enemy, moving by one flank and returning by the other. The first great raid was that made around McClellan's army in front of Richmond, in June, 1862. It was in reality a reconnaissance on a large scale, but partook somewhat of the character of a "raid," as a great deal of damage was inflicted upon the Federals by the destruction of stores of ammunition and provisions.

Stuart made the complete circuit of the Federal army.

His force consisted of 2,500 cavalry, and two pieces of horse artillery. Setting out from Taylorsville, the little column forced its way through the Federal lines, driving off the various bodies that attempted to resist their advance. A number of transports on the Pamunkey were also taken and destroyed, and convoys of supplies in great quantities seized and burnt. Having passed the rear of the whole Federal army, and destroyed the railroad, Stuart effected safely the passage of the Chickahominy river on their left flank, and safely returned to the Confederate lines, having thoroughly acquainted himself with the enemy's position, which was the main object of the expedition.

This was partly in the nature of an armed reconnaissance, and partly secret, as they tried to avoid fighting, and to conceal their movements as much as possible, while they were quite ready to attack whatever appeared to bar their passage. Colonel Von Borcke, in his "Memoirs of the Confederate War for Independence," says that in this raid "they destroyed the enemy's communications, burnt property to the amount of millions, captured hundreds of prisoners, horses, and mules, and put the whole Federal army in fear and consternation."

The information gained by this raid was exceedingly valuable, and enabled General Lee to plan the splendid operations called "the seven days' battles," in which "Stonewall" Jackson, a few days after, fell upon the flank and rear of McClellan's army with such perfect confidence and such terrible effect.

A few weeks later, on the 22nd August, 1862, General Stuart made another dash upon the rear of General Pope's army at Catlett's Station, on the Orange and Alexandria railroad. General Pope himself narrowly escaped capture, through having left his head-quarters on a reconnaissance. Colonel Von Borcke sums up the result of the affair as follows: "We had killed and wounded a great number of the enemy, captured 400 prisoners, among whom were several officers, and more than 500 horses; destroyed several hundred tents, large supply depots, and long waggon trains; secured in the possession of the quartermaster of General Pope 500,000 dollars in greenbacks, and 20,000 dollars in gold, and, most important of all, had deprived the Federal commander of all his baggage and private and official papers, exposing to us the effective strength of his army, the disposition of his different *corps d'armée*, and the plans of his whole campaign."

Upon the information thus acquired, General Lee planned

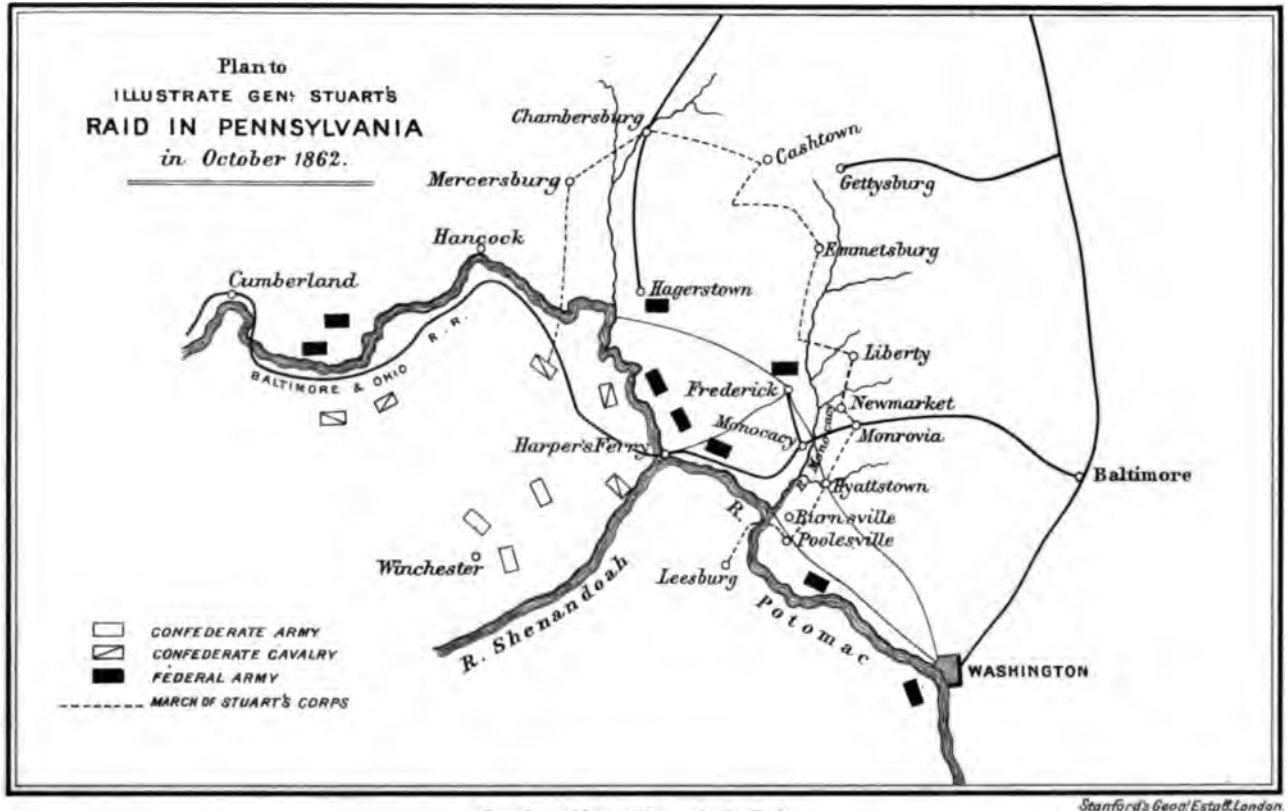
the turning movement by General Stonewall Jackson through Thoroughfare Gap, which culminated in the second battle of Manassas, and the total defeat of General Pope's army.

In this battle some heavy cavalry fighting took place, which proved that Stuart's cavalry, though excellent in raiding and reconnoitring, and in irregular fighting, were still accustomed to charge boldly in the open field. A large body of the Federal cavalry were covering the retreat of their broken infantry, when General Stuart, with Robertson's brigade, moved upon them. The 2nd Virginian Cavalry, under Colonel Munford, was in advance of the other two regiments, and at once charged vehemently upon the enemy. Their impetuous charge broke the first line, and drove it back upon the second line, which, charging in turn upon Munford's horsemen while disordered by the pursuit, drove them back in confused flight, shooting and sabring many of the men. At this crisis the two remaining regiments of the Confederate brigade came up under General Stuart, and at once charged furiously on the hostile lines. This attack, by fresh reserves, again turned the scale, the Federals were driven back in utter rout, with the loss of many killed and wounded, and several hundred prisoners and horses.[1]

On the 9th October, 1862, General Stuart made his greatest "raid," that through Pennsylvania around the Northern army. He set out with a force of 1,800 cavalry and four pieces of horse artillery, and on the 10th crossed the Potomac river and moved rapidly towards Mercersburg, which was reached at noon, and then Chambersburg, which was occupied at dark. The telegraph lines were cut in every direction, the railways obstructed, and large numbers of horses captured. All the public stores and buildings were destroyed. At Chambersburg General Stuart's position was very critical. He was directly in rear of the whole Federal army, in a hostile country, and some ninety miles from his own lines. He considered it too dangerous to attempt to return by the route he had come, and decided to make a wide sweep to the east and cross the Potomac some distance below the Federal army in the neighbourhood of Leesburg.

Every precaution was taken to deceive the enemy. Stuart first marched towards Gettysburg, then turned south towards Hagerstown, and then turned east again towards Emmetsburg, through which he passed and moved towards Frederick; then turning short to the east again he marched in the night

[1] Colonel Von Borcke's Memoirs.



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through Liberty, Newmarket, and Monrovia, where he cut the wires and the railroad. At daylight he reached Hyattstown, on McClellan's line of communications with Washington, where he captured a few waggons, and then pushed on to Barnesville.

At that point Stuart learnt positively that General Stoneman, with 4,000 or 5,000 men, was near Poolesville guarding the fords on the river. To deceive his opponent General Stuart started directly for Poolesville, but instead of moving upon that point avoided it by a march through the woods, leaving it two or three miles to his left, and so got into the road from Poolesville to the Monocacy. Guarding his flanks and rear, he then pushed boldly forward, and soon met the enemy marching towards Poolesville. This was the first serious attack he had encountered on the expedition, and here the ability of the cavalry to fight dismounted was of great service. The story had better be told in General Stuart's own words:—

"I ordered the charge, which was responded to in handsome style by the advance squadron (Irving's) of Lee's brigade, which drove back the enemy's cavalry upon the column of infantry advancing to occupy the crest from which the cavalry were driven. Quick as thought Lee's sharpshooters sprang to the ground, and engaging the infantry skirmishers, held them in check till the artillery in advance came up, which, under the gallant Pelham, drove back the enemy's force upon his batteries beyond the Monocacy."[1]

Occupying the crest, which he used as a screen to cover his real movement, Stuart made a rapid dash to his left to White's Ford, which was guarded by 200 infantry strongly posted in the cliffs. A few shells from the small guns, and the attack of the dismounted cavalry, soon drove off these enemies, and the passage of the ford was effected with all the regularity of the passage of a defile at drill. The enemy came up just as the whole force had safely effected its crossing.

Stuart's loss was trifling, while the information gained, the moral effect secured, and the consternation caused in the Northern forces were of the greatest importance. His cavalry marched on this expedition from Chambersburg to Leesburg, some ninety miles, in thirty-six hours, one of the most remarkable marches recorded in history.

The importance of cavalry being able to dismount and fight on foot is plainly manifested in the skirmish near Poolesville which has just been described. Here the same men charged as cavalry, drove back the enemy's horsemen from

[1] General Stuart's Report.

the crest of a hill, and then dismounting, by their fire checked the advance of the enemy's infantry long enough to enable the artillery and remainder of the column to come up to their assistance.

In June 1863 Stuart's cavalry corps had reached the large number of 12,000 men with twenty-four pieces of artillery, and on the 9th of that month the cavalry battle of Brandy Station took place, which was the greatest cavalry action of the entire war, 12,000 being engaged on the Southern side and about 15,000 on the Northern.

This fight was very peculiar in its character, for the troops on both sides fought dismounted with their rifles, while at times most gallant charges and counter-charges were made at speed. The line of battle extended nearly three miles, and along the woods of the Rappahannock the multitudinous firing of the dismounted sharpshooters sounded like the rattle of musketry in a regular battle. During the action a well-devised flank attack was made by two Federal brigades under General Percy Windham, who, by a circuitous march, had succeeded in turning Stuart's rear and thereby very nearly decided the fate of the day. Two Confederate regiments coming up from the rear made an impetuous charge and drove this force off in complete rout, with the loss of a battery of artillery and a large number of killed, wounded, and prisoners.[1]

The battle was finally decided by an impetuous charge of William H. Lee's and Jones's brigades against the Federal right, which was entirely successful and swept all before it. The Federal position being thus turned, they fell back, and crossing the Rappahannock, prevented pursuit by a heavy fire of artillery from a number of batteries placed upon the opposite bank of the river.

General Stuart was killed on the 11th May, 1864, while bravely fighting, with only 1,100 men, against General Sheridan, who was making a dash upon Richmond with a mounted force 8,000 strong in the hope of capturing it, as Haddick did Berlin in the wars of Frederick the Great. Stuart was a most efficient cavalry officer, his energy and impetuosity were unrivalled, while his tact and promptitude of resource saved his command on many critical occasions. His power of obtaining information of the enemy's movements was extraordinary. His loss was severely felt by the whole army, but by none more than by General Lee, who had planned all his best campaigns upon the information gained for him by Stuart and his cavalry.

[1] Von Borcke's Memoirs.

In the continuous fighting from the Wilderness to Hanover Court House and Petersburg, in 1864, General Lee had great difficulty in getting his reconnoitring work properly done. He sent one cavalry officer after another to obtain information, repeatedly ejaculating at one important crisis, "Oh, for an hour of General Stuart!" Turning to his staff, he remarked, "I can do nothing if my young men cannot keep me well informed."

Stuart was the ablest cavalry officer that the war produced, unless an exception be made in favour of General Forrest, who, although totally uneducated to the military profession, gave proof of an energy and an iron will such as distinguished Oliver Cromwell, and a soldierly aptitude for command such as could not be surpassed.

A few pages cannot be better employed in a "History of Cavalry," than in referring to the gallant operations of Forrest and his cavalry in the war in the South Western States.

General Forrest is six feet one-and-a-half inches in height, broad-shouldered, full-chested, and well built, with erect carriage. He was personally a man to attract attention long before he had acquired any fame, and at the commencement of the war was empowered to organise a regiment of volunteer cavalry. The first action in which he was engaged was an extraordinary fight between his regiment and a gunboat carrying nine heavy guns, and protected by iron plates. The gunboat had been sent to Canton, on the Cumberland river, to destroy a quantity of Confederate stores which were lying there. Forrest heard of the intended attack, and by a night march of thirty-two miles reached the point before the arrival of the gunboat. He at once dismounted his men and placed them under cover of trees and logs, along the bank of the river. The gunboat moved up, anchored, and opened a heavy fire of grapeshot and canister. Forrest's men, skilful marksmen and well-sheltered, fired through the open ports, at close range, with such perfect accuracy and such deadly effect as to compel the vessel to close her ports and get away as fast as possible.

At Fort Donelson, in February 1862, in the operations that ended so disastrously to the Confederate cause, Forrest, who commanded the cavalry there, gave proof of his striking capacity as a commander of horse, and attracted public attention by his conduct, which shone out brilliantly in comparison with that of the other leading officers. After a desperate sortie in which Forrest, on the extreme right of the Federal lines, turned their flank and drove them back a

considerable distance, the Confederate commanders determined to surrender.[1]

Forrest heard of the intention with marked dissatisfaction, and spoke so vehemently in expressing his feeling that General Pillow suggested that he should be allowed to attempt to escape with his command.[2] This was sanctioned on condition that he started at once before the flag of truce was sent out. He set out with his command and carried it safely away, while the remainder of the force was surrendered the following day. This affair established Forrest's reputation, and in every subsequent operation in which he was engaged he gave proofs of his extraordinary ability as a cavalry commander.

A few days after the battle of Shiloh or Pittsburg Landing, in which Forrest's cavalry had done good service, the Confederate troops were falling back, Forrest with some 150 men, forming the extreme rear. Near Monterey a Federal force of two regiments of cavalry and one of infantry came against him. A reinforcement joining him raised his force to 350 troopers. Forrest, with his characteristic impetuosity, decided to charge boldly against the immensely superior numbers of the foe.

The charge was made at speed, and when within twenty yards of the enemy the Confederates fired a volley with their shot-guns, which were formidable weapons at that short distance, and then rushed in with swords and pistols. So sudden and so impetuous was the onset that the Federal cavalry were at once overthrown, and driven in confusion through the infantry in their rear, who were broken and scattered by their own disordered horsemen. They had no time to rally, however; for Forrest was upon them like lightning, and with swift play of sabre, and rapid firing of the deadly revolver, the flying infantry and horsemen were pursued with merciless carnage.[3] The loss was very heavy, and many prisoners were taken. In this charge Forrest was severely wounded.

In July 1862 Forrest with 1,000 troopers, set out on an expedition against a detachment of Federal troops, under command of General Crittenden, which was lying at Murfreesboro. After some desperate fighting the attack was entirely successful, and the Federal general and 1,765 prisoners were taken, besides large numbers of horses, waggons, &c., as well as great quantities of arms, clothing, and supplies. This capture enabled Forrest to arm his troops

[1] Campaigns of Forrest, 75, 80, 81. [2] Ibid. 91, 92, 93.
[3] Ibid. 147.

with better weapons than they had previously been obliged to use.

At Trenton, in December, 1862, he charged the enemy with a portion of his cavalry mounted, and drove them into a fortified position, which they had strengthened with a breastwork of cotton bales and hogsheads of tobacco. Halting within fifty yards, he withdrew his force some two or three hundred yards so as to obtain cover, and then dismounting these same men and bringing up some guns, he opened such a fire of small arms and artillery that the Federals soon surrendered, and his small force, consisting only of his cavalry escort and a few artillery, in all not more than 275 men, were able to sum up the fruits of their victory. They amounted to 400 prisoners of war, 300 negroes, 1,000 horses and mules, thirteen waggons, seven caissons, 20,000 rounds of artillery, 400,000 of small-arm ammunition, together with a great quantity of equipments, stores, &c. This was all obtained by a gallant charge of about 200 horsemen which drove the enemy into their entrenchments, followed by a bold attack by these same horsemen, acting dismounted as infantry. The American Civil War teems with instances proving that their mounted riflemen were able to do what it is said European cavalry have often failed in, namely, to act with boldness and skill, both on foot and on horseback.[1]

On his return to the Confederate lines Forrest fought a desperate action at Parker's Cross Roads, with 1,200 men, against 1,800 Federals. His order of battle was in one line of dismounted riflemen, with about 100 mounted on each flank, and six guns, along the line, two in the centre, and two near each wing. The Federal force was defeated after hard fighting, its retreat cut off, and white flags hoisted with the object of surrendering, when two Federal brigades came up in Forrest's rear, with several pieces of artillery, and opened fire upon him. The beaten force at once resumed their arms and renewed the fight. Forrest, at the head of seventy-five horsemen, charged boldly at the guns of the fresh force, dispersed their gunners, threw the infantry supports into confusion, and carried off the caissons of three of the pieces. This gave time to his dismounted men to regain their horses and to mount. When mounted they were again able to resume the offensive; and moving rapidly out of reach of the immensely superior numbers of the Federal infantry, Forrest with his characteristic impetuosity made a dash upon the waggon train of the enemy, seized it, and carried it safely from the field. In this action Forrest used a large portion

[1] Forrest's Campaigns, 201, 202.

of his cavalry dismounted to form in line of battle as infantry, and so to drive his opponents out of a strong position.

When attacked suddenly in rear, he made a brilliant charge of cavalry with those men who had been held in hand mounted, and gave an opportunity for his force to regain their horses. Then the whole command resuming its cavalry *rôle*, dashed around the rear of the enemy's lines, and carried off the whole baggage train and supplies.

This is another good illustration of the admirable fighting qualities of Forrest's cavalry, and of their ability to act boldly and effectively either mounted or dismounted. This may be attributed to the superior intelligence of the Southern gentlemen of whom his force was mainly composed, men of extraordinary self-reliance and strong common sense; men who knew perfectly well when each system of fighting would be most advantageous, and who had gained their experience of the practical work of war upon the battle-field. It must be admitted that the circumstances in America were peculiar to the continent, and that the same system might not be quite so successful in European armies, filled with peasants of less intelligence than the American citizens.

At the battle of Chickamauga, fought on the 19th and 20th of September, 1863, Forrest's cavalry, as well as all the other cavalry of the Confederate army, fought on the flanks of the army in line of battle, being dismounted as infantry, a small force only being kept mounted to act promptly in case of emergency. These dismounted cavalry fought as bravely and to as much purpose as the best infantry in the army. After the victory was gained Forrest, putting his men again in the saddle, pressed on after the retreating Federals, and captured a number of prisoners. He penetrated within half a mile of Chattanooga, and after vainly urging his commander-in-chief to follow up and perfect the victory, he returned to the Confederate lines, deeply mortified at the apathy displayed, but carrying with him large numbers of prisoners.[1]

In repelling a Federal cavalry raid, under General W. S. Smith, in February, 1864, a series of fights took place. The most important was at Okolona, where Forrest used with extraordinary skill his favourite system of fighting, sometimes mounted, and sometimes dismounted, as the exigency of the moment required. The battle opened by a fire from the Confederates; then three regiments alighting from their horses and forming in line on foot charged the Federal position, while Forrest himself with one regiment mounted swept

[1] Campaigns of Forrest, 351, 352.

around and charged the right flank of the enemy's line. This combined attack was successful, and the Federals falling back took up a second position.

Pressing on in pursuit, Forrest came upon the enemy drawn up in four strong lines on a ridge. His troops were scattered somewhat by the long pursuit, so he drew them back to a favourable position, and with the small force he had in the advance drew them up in line to resist a counter attack.

The Federals charged boldly upon him in successive lines, which were all repulsed by the withering volleys of the dismounted sharpshooters, except the fourth or last body, which broke through his lines. And now comes the strangest part of the story. The dismounted Confederate cavalry, although broken and mingled with a mass of charging horsemen, would neither yield nor fly, but at once commenced waging a hand-to-hand combat with their revolvers against their mounted antagonists.[1] This was said to have been one of the most fiercely contested struggles of the war. It ended in favour of the Confederates and their revolvers. The Northerners were broken and dispersed, and many captured. Those who broke through and rode on to the rear were badly handled by the Confederate reserves, many being killed and wounded, and many taken prisoners.

Fort Pillow, a strong work armed with six pieces of artillery and garrisoned by 580 men, was stormed by Forrest on the 12th April, 1864, with his cavalry, whom he dismounted for the purpose.[2]

At the battle of Tishimongo Creek, 10th June, 1864, two strong lines of Federal infantry pressing upon three of Forrest's regiments, which were dismounted, charged so bravely that they came steadily up to within thirty paces of the Confederates, who then drew their revolvers, and at close range used them with such deadly effect, that they at once drove back the enemy with great slaughter and pressed after them, using their pistols freely in the pursuit. They were then halted and re-formed, and the horses being brought up they mounted and harassed the flying Federals in their retreat. In this action Forrest had only 3,200 men, as against nearly three times that force under General Sturgis, and yet in two days he had driven the Federals fifty-eight miles, with the loss of nineteen guns, twenty-one caissons, 200 waggons, and thirty ambulances, with large quantities of supplies.[3] More than two thousand prisoners were taken, and 1,900 of the Federal dead were left upon the battle-field or on the line of retreat. If success be any test of the value of cavalry organ-

[1] Campaigns of Forrest, 400. [2] Ibid. 437. [3] Ibid. 480.

ised upon the system used by the Americans in their Civil War, this terrible defeat of a greatly superior force of infantry, cavalry, and artillery by a small movable column of mounted riflemen ought to settle the question.

In the brilliant dash upon Memphis on the 21st August, 1864, Forrest captured by a *coup de main* a large city occupied by greatly superior forces of the enemy, captured a number of prisoners, and safely effected his retreat with little or no loss. This affair is interesting to the professional soldier from the fact that the Confederate advance-guard, only forty strong, composed of picked mounted men, charged a battery of six pieces of artillery, revolver in hand, and captured the guns, killing and wounding some twenty of the gunners.[1]

Forrest had made his cavalry perform almost every species of service that falls to the lot of land forces—they had acted as cavalry and as infantry, they had fought in line of battle, as at Chickamauga, they had driven off gunboats, they had stormed fortifications, and built bridges. They were, however, not to close their career without having an extraordinary and novel experience.

In October, 1864, Forrest decided to make an effort to impede the navigation and use of the Tennessee river, which was filled with Federal gunboats and transports. Choosing a strong position on the bank of the river, he concealed his force, masked his guns in position, and awaited the approach of the enemy's vessels.[2] On the 29th October the steamer *Mazeppa*, with a barge in tow, was attacked and disabled, her crew running her on the opposite bank and escaping. Captain Gracy, of Forrest's cavalry, swam across the river and brought a yawl back, and the vessel was soon in the possession of the Confederates, with her cargo containing large supplies of military stores.

The gunboat *Undine*, convoying the steam transport *Venus*, came down soon after, and after a vigorous fight, in which the artillery played upon them, while the Confederate sharp-shooters kept up a deadly fire upon the open portholes of the gunboat, both vessels were captured by the cavalry, and, being repaired, were manned by detachments chosen from the command, and the Confederate flag was soon floating from both vessels. Forrest made a trial trip with his fleet as far as Fort Hieman to see that all was in condition for service; the horsemen on shore making the air ring with cheer after cheer for their comrades who had taken service on the novel element.

[1] Campaigns of Forrest, 540. [2] Forrest, 592.

The Federals soon brought down an overpowering force of gunboats to restore their supremacy upon the river. The Confederates had been obliged to retain the Federal engineer of the *Venus* to manage the engine, and he, having treacherously cut the tiller rope, the vessel became unmanageable, and, running her ashore, Colonel Dawson, who had been placed in command, abandoned her, and his men resuming their horses, again became cavalry. A day or two after, the *Undine*, being greatly overmatched, was run on shore, abandoned and burnt, the troopers scampering off to their horses, fonder of their saddles than ever. Thus terminated the operations of Forrest's cavalry afloat, the destruction of several vessels, the interruption of the enemy's communications for several days, and the great moral effect, being the only advantage to the Confederates.

We shall conclude our references to the operations of Forrest's cavalry with an account of the pursuit and capture of Colonel Streight's command in Alabama in May, 1863.

Forrest, perceiving that Streight meditated a sweeping raid into the interior of the Confederacy, took vigorous steps to oppose him.

He first came up with him at Day's Gap, and after a skirmish the Federals fell back to a good position on Sand Mountain. Forrest at once attacked but could not succeed in carrying the position, and after desperate fighting he withdrew his men to re-form them for another attack. Streight took advantage of the opportunity to fall back, and after a running fight for some miles, made another stand at Long's Creek. Heavy fighting took place there, and the Federals were again routed. After retreating some ten miles, and night having come on, Streight again halted, but the swift-riding, hard-smiting, restless Forrest was close upon his tracks, another fight took place in the thick darkness, and again the Federal horsemen fled in confusion.

The never-tiring Confederate leader still pushed on and pressed them for six miles, where another stand was made, another night action fought, another victory won by the Southern cavalry.

Forrest then halted two hours to feed and rest his men and horses, who had been without food and rest for nearly twenty-four hours. It was necessary also to let his stragglers come up, to overhaul his ammunition, and to re-form his command.[1]

At daybreak Forrest led the way again, and his men cheerfully renewed the pursuit. At Blountsville at 11 A.M. they again overtook the enemy, and soon drove them out of

[1] Campaigns of Forrest, 264.

the place, capturing some ammunition and supplies. A running fight then took place with the rear-guard for ten miles to the Black Warrior Creek, where more fighting took place, and, night coming on, another halt was ordered by Forrest for three or four hours to feed and rest his weary men and horses.

At midnight the pursuit was again resumed, and after marching fifteen miles they reached Wills Creek, where the enemy were again struck, and driven easily with the loss of some prisoners, forage, and horses. Another halt of a few hours took place to feed the horses. This desperate rate of marching was beginning to tell severely upon Forrest's command. So many horses had given out, so many stragglers had fallen behind, that Forrest set out from this point with only 600 men for the final struggle, and these men, worn out by three days and nights of almost continuous riding and fighting, showed signs of exhaustion, and many had fallen asleep on their horses. Forrest revived and encouraged them by a vigorous speech, and the small column moved on again. They soon overtook the flying enemy, and a running fight for ten miles took place to the Black Creek, which the Federals crossed by a bridge which they burned under cover of their artillery.

A young Southern lady, a resident of the locality, seeing the necessity of a ford for the Confederates, came up to General Forrest and offered to show him an old unused one not far off. She got up on his horse behind the general, and galloping to the point showed it to him under the fire of the enemy's sharpshooters, and the Confederates in a short time were across the river in full pursuit.

Gadsden was soon reached, and then Forrest, selecting 300 of his best mounted men, again led the advance, and after a race of nine or ten miles, the enemy were again overtaken about 5 P.M. on the 2nd May, at Turkeytown, where another sharp fight took place. Streight had prepared an ambush, but Forrest's impetuous rush at full gallop, his men firing right and left, with pistols and rifles, carried him past the ambuscade with little loss, and broke the Federal lines beyond; killing, wounding, and capturing a number of them. It was now dark, and again the enemy were flying. Forrest halted for the night, to let his scattered troops come up, and to give his horses the rest that had become absolutely necessary.

By sunrise on the 3rd, the remnants of the Confederate force, now only 500 effective men, were again on the march, and about 9 A.M. the Federals were overtaken, and driven for

some distance, when they rallied, and formed up, once more to give battle. Forrest, whose impetuous spirit and boiling courage led him instinctively to deal hard crushing blows, was nevertheless always watchful to gain his object by stratagem, if that were possible, and he thought the time had now come to try to obtain a surrender.[1] His force was so small, that while the negotiations were going on he was obliged to make the most skilful displays of his command, and by showing portions of it rapidly at different points, to impose upon the Federal commander.

At last a surrender was agreed upon, and Forrest, to conceal the paucity of his numbers, said that on account of the difficulty of obtaining forage, he would only take two regiments to escort his prisoners to Rome, some miles distant, and that the remainder of his force would be sent to neighbouring towns. To deceive Colonel Streight, he gave fictitious orders in his hearing, directing fabulous corps on his flanks, to be marched to different points. 1,700 men then capitulated to about 500.

This affair has been detailed at some length, as there is probably no instance in history where a pursuit by cavalry has ever been conducted with greater energy and perseverance than this most celebrated of all Forrest's operations.

For three days his men had marched an average of forty-one miles each day, fighting for hours several times daily and nightly, and after that, in the last forty-eight hours of the expedition, he had led his men, weary and jaded as they were, a distance of full ninety miles. At the surrender, the Confederates formed up in line to receive it were so overcome with sleep that they were nearly all nodding, unable to keep their eyes open.[1]

The above accounts of a few of the more important actions of Morgan, Stuart, and Forrest, will give a pretty clear idea of the manner of fighting which was carried on in the American Civil War by the type of cavalry which came into use with it. To the Southern generals, Forrest and Morgan, both unprofessional men, is to be attributed the credit of having originated and adopted a system of cavalry tactics (we may even say strategy), that was new in many of its features, and a most successful adaptation of the modern improved firearms to the use of horsemen.

The principal idea, that of using missile weapons on horseback, and of employing the horses simply to carry men to points where they were to be employed on foot, has, as we have seen, been often thought of, and repeated attempts made

[1] Campaigns of Forrest, 273. [2] Ibid. 276, 277.

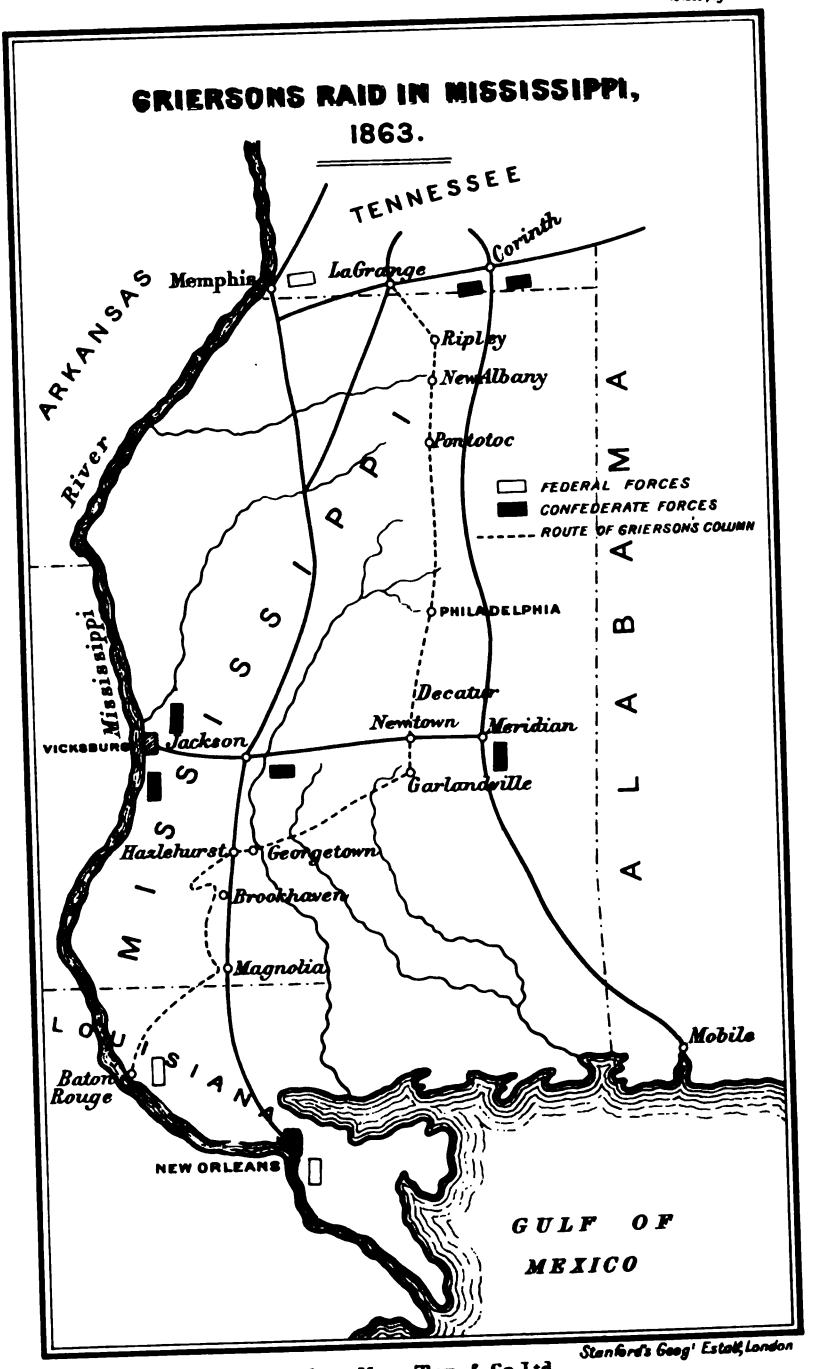
to apply the principle practically. Alexander had his dimachos, the Parthians used their arrows, the Romans dismounted to fight on foot, the knights used petronels, the men-at-arms arquebuses and pistols, and dragoons were much used subsequently, but not often to advantage. In the deductions we purpose placing at the end of the historical portion of this work, we will consider the reasons for this failure, and whether those reasons exist at the present time.

In the American Civil War the cavalry performed great services; and these services were performed in their capacity of mounted riflemen. The Southerners originated the employment of cavalry in this way, and were very successful until the Federals had learned their system, and in time, with their superior resources and overpowering numbers, beat the Confederates with their own weapons. We have detailed the operations of the Southern cavalry first, and will now proceed to show the great results gained by the same type of horsemen in the Northern armies in the closing years of the war.

In the spring of 1863, it was at once seen that the United States authorities had become fully impressed with the value of the new style of cavalry, and aware of the importance of having a large force to be employed in raids and excursions into the enemy's lines. During the previous winter, immense efforts had been made to organise large bodies of mounted riflemen, well equipped and well armed, and trained to fight on the new system.

The first great successful raid on the part of the Federals was that through Mississippi in 1863 commanded by General Grierson. He set out from La Grange, Tennessee, on the 17th April, with a brigade of cavalry some 2,000 strong, and went through the heart of the State of Mississippi, ransacking the whole country, destroying supplies, cutting railways and telegraph lines, and burning bridges, stores, &c. He passed through Pontotoc and Decatur, and reached the Southern Railroad at Newton on the 24th April.[1] Having destroyed some cars, engines, and bridges, he moved on to Georgetown, where he crossed the Pearl river, and moving over to the New Orleans and Jackson railroad, cut it at Hazelhurst, destroying stores and trains, and then moved down the railway to Brookhaven, where he burned the railway depot at that point and the cars found in it.[2] He arrived at Baton Rouge on the 2nd May, having travelled over 300 miles through the heart of the enemy's country, inflicting serious blows upon his communications, and without suffering any loss. This raid of Grierson was greatly aided by the expeditions under Dodge

[1] Johnston's Narrative, 168. [2] Pollard's Second Year of the War, 268.



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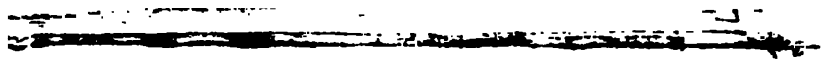

and Streight, which employed the Southern cavalry under Forrest, and prevented them from being detached to interrupt the march through Mississippi.

A few days after Grierson's raid the campaign of 1863 opened in Northern Virginia with another cavalry expedition by the Federal horsemen under General Stoneman, in the rear of General Lee's army. This was intended to have a co-operating effect upon the attack which General Hooker was about making at Chancellorsville against the Confederate left rear. Averill set out first to draw the Southern cavalry to their left, in order to leave the way open for Stoneman with the main force to make a dash into the rear of General Lee's position. Averill had a sharp action with General W. H. F. Lee's brigade of cavalry at Rapidan station on the 1st May, and during that day Stoneman with the main force, consisting of about 10,000 men, marched by Racoon ford to Louisa Court House, which he reached early on Saturday morning, the 2nd May, Averill the same day falling back to the right rear of Hooker's army. W. H. F. Lee, with only 900 men, had a skirmish with a portion of Stoneman's command on the 2nd between Gordonsville and Louisa Court House, but was obliged in the end to fall back before the superior forces of the enemy. On the evening of the 2nd Stoneman was at Thompson's Cross Roads, in the rear of the Confederate army, and directly between it and its base. At this point he decided to spread his command and strike out in every direction. Consequently one portion, consisting of one regiment under Colonel Wyndham, pushed south to Columbia, on the James river, and there destroyed all the public property, captured a number of horses and mules, and rejoined Stoneman the same night at Thompson's Cross Roads. W. H. F. Lee followed and harassed him, but being greatly overmatched could effect nothing important.[1]

Another detachment under Colonel Kilpatrick moved eastward to Hungary Station on the Fredericksburg railway, reaching there early on Monday the 4th.

Here he destroyed the depot and tore up the railway on the direct line between Richmond and the Southern army. From Hungary Station he moved to Meadow Bridge on the Central Railroad, which he destroyed, together with an engine. From there, crossing the Pamunkey river at Hanover town and then the Matapony, he swept through Essex and the adjoining counties and reached Gloucester Point in safety on the 7th, having on the way destroyed some waggon trains and small depots of supplies.

[1] Hotchkiss and Allen, 105.

A third detachment, under Colonel Davis, marched down the South Anna, struck the Fredericksburg Railway at Ashlands Station, and destroyed it, and intercepted an ambulance train from Chancellorsville, upon which they captured a number of prisoners. Here they destroyed some engines, and moving across to the Central Railroad, burned the depot and tore up the track. Moving then southwards towards Richmond, they turned eastwardly in the direction of Williamsburg. Being intercepted by a force sent out to cut him off, and being repulsed in an attack upon them, Colonel Davis turned with his command to the left, crossed the Pamunkey and Matapony rivers. and finally reached Gloucester Point in safety.

Other parties destroying all the bridges, &c., in their neighbourhood, rejoined Stoneman at Thompson's Cross Roads, on Tuesday, the 5th, when the whole command except those portions under Davis and Kilpatrick were concentrated at Yanceyville, and commenced a retrograde march by way of Racoon ford and Kelly's ford, to rejoin Hooker, which was effected on the 8th May.

This raid, though apparently successful, was in reality a failure. The damage inflicted on the communications of the Southerners was very slight, and readily repaired. The expedition, although having a free range through a wide sweep of Southern territory, did but little damage, took, comparatively speaking, no prisoners, and exercised no moral effect. The great battle of Chancellorsville had been fought in their absence, and after three days' fighting, the Confederate general had won the most brilliant victory of the war, and extricated his army from a most perilous position, by one of the boldest and most adventurous plans of battle ever adopted, and one which was splendidly successful, through the want of cavalry on the part of the Northern army on their right flank.

Chancellorsville was won by the flank march made by Jackson's corps around Hooker's right, by which the Southern army, far inferior in numbers, divided itself, and placed the Northern army between its two weak fractions. This was successful only because it was a complete surprise. Had Stoneman's 10,000 cavalry been swarming over the country in the neighbourhood of Hooker's exposed flank, Jackson's columns would have been enveloped and destroyed while winding along the narrow roads and difficult defiles of the "Wilderness," through which his flank march was so successfully and skilfully made.

Stoneman's raid is a good example of an ill-advised and

ill-timed adoption of a course of action, which, if judiciously employed, might produce most important results.

Had Stoneman turned north when he found himself in Lee's rear, and moved boldly up against his lines, he would have effected a most important diversion, and might have arrived in the crisis of the battle, when an unexpected attack of 10,000 men in the Confederate rear would almost certainly have entailed the destruction of their whole army.

We will now give some particulars of the great Federal cavalry raid under Wilson through Alabama in 1865, which was so successful, and had so important an influence in ending the war in the south-west.

During the early part of 1865 the cavalry corps of the Federal army of the Mississippi Department, numbering 22,000 men, had been encamped on the north bank of the Tennessee, between Waterloo and Gravelly Springs. They were under the command of General Wilson, a cavalry officer of high reputation in the army. Wilson for many weeks had been devoting his entire energies to the drill, organisation, equipment, and discipline of his command. Having the inexhaustible supplies of the United States Government to draw from, his men were magnificently armed and supplied, and every care was taken in giving them thorough instruction, and in bringing the whole force into the most complete state of efficiency and mobility. The troops were drilled in the double-rank formation. They were somewhat short in horses, so that the mounted force was only 17,000 strong.[1]

In front of Wilson was the indomitable Forrest, an antagonist to be approached with care, but how different was his position! While Wilson was drilling and equipping his force with every facility, Forrest had to scatter his men to obtain food, to get clothing and remounts, and to recruit his weak regiments.

On the 18th March, General Wilson set out on his expedition through Alabama. It was not intended as a mere raid. The Confederate troops had become so thinned by four years' desperate fighting, and the Northern cavalry had been organised upon such a large scale, that in this case a whole invading army was composed of cavalry.[2]

The force consisted of 12,000 horsemen, with artillery, and 1,500 dismounted men to guard the trains, and to be mounted as fast as horses could be obtained. Everything that could give mobility to this column had been considered. Every trooper carried five days' light rations in haversacks, twenty-four pounds of grain, 100 rounds of ammunition, two extra

[1] Andrews, 243; Forrest, 659. [2] Forrest, 659.

horseshoes. Pack animals carried five days' extra rations of hard bread, and ten of coffee, sugar, and salt; while forty-five days' rations of coffee, twenty of sugar, fifteen of salt, and eighty rounds of extra ammunition, were carried in the waggon train. The supply train numbered only 250 waggons, and it was considered that, with what could be gleaned from the country, the column had a sufficient supply for a campaign of sixty days.[1]

They had also a light pontoon train of thirty boats, transported by fifty waggons. To meet this moving army, Forrest only had some 6,400 men, widely scattered, and maintained in supplies with the greatest difficulty. When Wilson did move, he moved so rapidly as to strike Forrest before he could get his men concentrated, and consequently he was able to force him back with little difficulty.

Wilson's movement south commenced on the 22nd March from Chickasaw, and to deceive the enemy and enable the force to be more easily fed, it marched by divergent roads; Upton's division moving by Russelville, Mount Hope, and Jasper; Long's division by Cherokee Station, Frankfort, and Thornhill, to the same point. McCook's moved by Eldridge, also to Jasper. From Jasper the whole command united marched by Elyton to Montevallo. Here fighting began with the Confederate cavalry, under Roddy and Crossland. The weak force of the enemy were soon driven back to Six Mile Creek, where they again made a stand, and were again forced back towards Randolph. The next morning some of Wilson's scouts captured a Confederate courier with despatches, which laid bare before him the disposition of Forrest's command, and the weakness of the force in front of him. He decided to press him without cessation, and drive him by main force into the works around the city of Selma, which was the objective point of the campaign. Six miles north of Plantersville, at Ebenezer Church, a desperate fight ensued. Forrest had only 1,500 men, and six guns, with which to oppose a force of some 9,000 of the Federals.[2]

General Long's division of the Northern Army, which was in the advance, opened the action—the 72nd Indiana mounted infantry, being formed up, dismounted, drove back the Confederate advanced lines, and followed up the success with a charge of four troops of the 17th Indiana mounted infantry, at the gallop, sword in hand. This charge drove the skirmishers in upon the main line, broke through it, and, turning to the left, rode round to their own lines with some loss. The Confederates soon regained their steadiness, and

[1] Andrews, 244. [2] Forrest, 666.

continued the fight. Upton's division, which had been advancing by a road to the east, hearing the firing and noise of the action, turned to the right, and, moving rapidly up at a trot, soon came into action, and dismounted, and deployed so as to strike the Confederate right flank. This turned the scale of the battle, and the Confederates were driven back with severe losses. This fight took place on the 1st April, and Wilson and his command bivouacked that night near Plantersville, within nineteen miles of Selma.

The next morning, at daybreak, the advance was pushed on towards that place. This most important point was fortified with a bastioned line, extending from the river three miles below the city, on a radius of the same distance, around to a point on the river above. These fortifications were protected, both to the east and west, for a long distance, by deep, miry, and difficult streams. The profile of the earthworks was as follows: Height of parapet six to eight feet, thickness eight feet, depth of ditch five feet, width ten to fifteen feet, height of stockade on glacis five feet.[1]

Here this cavalry army was before a strongly fortified position with a continuous curtain wall, flanked with bastions, and having a stockade on the glacis outside the ditch. Wilson had his forces in position about 4 P.M., and Forrest, with an inadequate force of 3,000 or 4,000 men, endeavoured to defend the place. Long's division of the Federal cavalry commenced the assault. His command was formed in line of battle dismounted, the 17th Indiana on the right, then the 123rd Illinois, the 98th Illinois, the 4th Ohio cavalry, and the 4th Michigan cavalry, in all 1,500 men. They charged across the open ground six hundred yards, climbed over the stockade and defences, under heavy fire, and succeeded in effecting an entrance and driving the Confederates in confusion towards the city.[1] Upton's division charged over the stockade the same way, the men getting on each other's shoulders to climb over. The place was taken, Forrest escaping with his staff and a number of his men by the Burnsville road.

In this affair Wilson's 9,000 cavalry with 8 guns captured 31 field-guns and 1 thirty-pounder Parrott, 2,770 prisoners including 150 officers, a number of colours, and large quantities of stores of every kind. Wilson remained at Selma for some days, gathering in his detached parties, and energetically engaged in building a bridge across the Alabama river, at this point 870 feet wide. On the 10th he crossed his command to the south bank, having first destroyed the foundries, arsenals, arms, stores, and military

[1] Andrews, 254. [2] Ibid. 254.

supplies of every kind in Selma; materials of war, which had made it one of the most important depots in the Southern States, and its loss a most disastrous blow to the falling Confederacy.[1]

Wilson had succeeded in capturing enough horses to mount all the dismounted men, and replenishing his supplies, and destroying his surplus waggons, and taking every step to give mobility to his command, he set out by way of Montgomery into Georgia, intending to destroy what he could and join Sherman in North Carolina. Montgomery was soon taken, 90,000 bales of cotton being burned in anticipation by the Southern troops.[2] All the public stores were here destroyed. On the 14th Wilson moved into Georgia; on the 16th the fortified posts of Columbus and West Point were taken; on the 20th he entered Macon, where news of the armistice reached him, and hearing that Jefferson Davis was trying to make his escape, he sent forces in pursuit, and succeeded in capturing him on the 11th May.[3]

This was one of the most remarkable cavalry operations of the war, for, as we have said, it was not a mere raid or dash, but an invading army determined to fight its way through. Its success was greatly to be attributed to the utter exhaustion of the Confederacy at that late period of the struggle. It is certainly, however, one of the most extraordinary affairs in the history of the cavalry service, and almost recalls the romantic episodes of the Crusades, where the armies consisted almost solely of knights, who dismounted to attack fortified places. It is a striking illustration of what can be done by the judicious use of a force of mounted riflemen, if bravely led and skilfully commanded.

We shall conclude the references to the operations of the horsemen in the American Civil War with an account of one of the most important services ever performed by a body of cavalry in modern times. The operations of Sheridan's corps of mounted riflemen in the spring of 1865 in the neighbourhood of Petersburg and Richmond, operations which virtually exercised a controlling influence upon the fate of the war, and secured the evacuation of Richmond and the ultimate surrender of Lee's army, will well repay the careful study of the cavalry officer.

For four years a succession of Northern armies, led by a succession of their best generals, had made unceasing efforts to capture the capital of the Confederacy. They had arrived

[1] Andrews, 258. [2] Ibid. 259. [3] Havelock, 112.

within sight of it once before, only to be hurled back in utter rout with fearful losses. In almost every great battle the Southerners had been victorious, the generalship of their commanders and the bravery and steadiness of their men being superior to that of their opponents. Time brings queer changes, and it was the sad fate of the Southern people to succumb to a system of tactics which they themselves had originated, but which their assailants had perfected and employed upon a more extensive scale.

Grant had fought his way to his position to the south of Petersburg, where, with a close and secure base at City Point, he was able to feed without difficulty his immensely superior army; and was carrying out his policy of wearing out the Southern cause by the "mere attrition" of constant hammering at their lines. From June 1864 until the spring of 1865 General Grant had been to the south of the James river, but all his efforts to drive the Southerners from their lines had failed, and Lee's ragged but gallant army held their own in spite of the vigorous attacks of overwhelming numbers.

In January 1865 Grant seems to have conceived the idea that if he could cut off the communications of Richmond with the heart of the Confederacy he would stop the supplies and so enforce an evacuation of the place or a surrender. This duty he laid out for his horsemen.

There were three main lines of supply from the interior into Richmond; the James river canal on the north, the Danville railway on the south of it, leading to Richmond, and more to the south still a railway from Burksville to Petersburg called the South Side Railway. To cut these was now Grant's great object. Sheridan, with a large force of cavalry some 10,000 strong and a much larger force of infantry, was in the valley of the Shenandoah, north of the James river, watched by General Early with a very weak force of Confederates.

Sheridan was ordered in the early spring to defeat Early, to push on to Lynchburg and there destroy the canal, and crossing the James river, make a raid southerly cutting the two railways, and sweeping down, to join Sherman in North Carolina. Sheridan set out on the 27th February and reached Waynesboro on the 2nd March, when General Early, fearfully overmatched, was virtually run over by the swarm of Federal horsemen. Then pressing on he reached the canal, and blowing up the locks and breaking down the banks, so destroyed it as to make it utterly useless. He was unable however to cross the James river, which was much swollen,

and turning to the east followed its banks towards Richmond, which he passed to the north, and on the 10th March reached the Pamunkey at White House, where he opened communications with Grant's extreme right. On the 26th of March he crossed the James river at City Point and took up his position in Grant's rear. Grant's lines extended from City Point for twenty-five miles towards the south-west, and were strongly entrenched. Lee's lines, on a shorter arc, extended in the same direction, but the exposed country to the west left an open field for the employment of the immensely superior force of cavalry now at Grant's disposal.

He decided therefore to use his horsemen in wide turning movements to sweep around Lee's exposed flank, and turning it and driving it back towards Richmond, to press on and cut the railways, which were the only remaining sources of supply to the Confederate army.

Lee was very inferior in strength to the Federal forces, which amounted to 160,000 of all arms, while he had only about 45,000 or perhaps less. Grant was consequently able to fully defend his lines while he detached a large force to execute turning movements around Lee's right flank. The force detached for this purpose consisted of the whole of Sheridan's cavalry supported by the second and fifth army corps, and as it circled around to the left the positions taken were continually entrenched in order to protect the army against an attack in flank while moving on.

Sheridan set out with his cavalry corps, 10,000 strong, on the 29th March, 1865, moving by Reams Station towards Dinwiddie Court House, which was occupied that night; the second and fifth corps being on Sheridan's right and keeping up the communications with the left of the main position. The positions assumed that day were entrenched in anticipation of an attack, which was made the same afternoon by a Southern division and repulsed. Early on the 30th March General Merritt, with four brigades of cavalry, set out to reconnoitre towards Five Forks, the strongly entrenched post which was the *point d'appui* of Lee's right flank. The Confederate cavalry pickets were driven into the works by the Federal dragoons, who in turn had to fall back.

During the 30th the infantry corps also moved up and by that night were on the Boydtown Road, between Gravelly Run and Hatcher's Run. On the morning of the 31st a general attack was made by the whole Federal infantry force in the neighbourhood of the Confederate position, which was along the White Oak Road, and was strongly fortified with entrenchments and abattis. The attack was repulsed and

the Federals driven back to the Boydtown Road, where they rallied.

Sheridan on the left had moved forward at the same time, and the Confederates had an opportunity of directing their efforts against him. An attack was made by Fitz Lee's Confederate cavalry and two infantry divisions, which was repulsed. A second attack drove a portion of Sheridan's cavalry to the east, and they were obliged to make a detour to rejoin the command. An obstinate and hotly-contested fight then took place to drive Sheridan back, but his horsemen dismounted, and using repeating rifles and firing from the cover of slight breastworks hurriedly made of rails, defeated the enemy, who, with all his cavalry and two infantry divisions, made most desperate efforts to drive them back from the position they had gained. When night came on these cavalry held their ground against all three arms, and so ended the first day's action at Five Forks.

Sir Henry Havelock, in his work on "The Three Main Military Questions of the Day," from which we obtain many of the foregoing details, commenting on this action, makes the following remarks on the comparative merits of the different systems of using horsemen:—"There is no British cavalry officer of experience in war that reads this but will candidly admit that under similar circumstances, commanding cavalry whose carbines only carry 300 or, with some rifles, 600 yards, his men dressed in a manner wholly unfitting them to work on foot, braced and strapped down within an inch of their lives, encumbered with long spurs and tripped up by jingling steel scabbards, he would first have fruitlessly attempted to keep back the advancing infantry by mounted skirmishers, whose fire is about as effective as that of so many boys' popguns, then perhaps charged repeatedly each time with great loss to his men; then finally, consoling himself with the axiom that 'cavalry are an offensive and not a defensive arm,' he would have come to the conclusion that that was no place for his troops opposed, unsupported, to all three arms, and after tremendous loss of life and horseflesh, all to no purpose, would have retired on the main body, leaving the disputed ground to the enemy, *and causing the whole three days' work by which it had been gained to be done over again at some future time.*"[1]

The defensive power of Sheridan's cavalry was evidently the means of enabling the corps on his right to rally and regain their position, and prevented a defeat, and this defensive power could not have been effectively secured under any

[1] Havelock, 79.

other system of tactics or armament. Grant, in his final report, speaking of Sheridan's conduct on this occasion, said: "Here General Sheridan displayed great generalship. Instead of retiring with his whole command on the main army to tell the tale of superior forces encountered, he deployed his cavalry on foot, leaving only mounted men enough to take care of the horses. This compelled the enemy to deploy over a vast extent of ground, woods, and broken country, and made his progress slow."[1]

On the morning of the 1st April Sheridan had planned a movement to turn the Confederate flank and cut off a portion of their line; this was frustrated by the slowness of Warren's corps in moving up, and by the Confederates rapidly retreating towards their position at Five Forks. He then made a feint with his cavalry to turn their right, while the 5th corps turned them on the left and cut off their communication with Petersburg and the remainder of Lee's army.

General Merritt, with three brigades, drove the Confederate right, by several impetuous mounted charges, into their outer lines of temporary works, then dismounting they attacked these lines and drove the enemy out of them. Everything was now ready for the general attack. The 5th corps was ordered to swing the right forward, and, turning the Confederate left, sweep it into the main works at Five Forks. This was soon done, and the Federal infantry pressing on attacked the works from the east. At the same time the cavalry having, as we have said, driven the enemy into his works from the west, now prepared to make a simultaneous assault upon the lines from that direction.

Three brigades were dismounted and made the attack vehemently. The slaughter was terrific, and several times the men, appalled by the carnage, staggered back; but they were urged and cheered on until the enemy, exhausted and attacked on three sides, rushed to the rear, which was the only escape open to them.

The dismounted cavalry swarmed over the works at many points, meeting their comrades of the 5th corps of infantry, who had entered on the opposite side. The rout was complete. Merritt's mounted reserve brigades dashed forward in pursuit at once, "and riding into their broken ranks so demoralised them that they made no serious stand after their works were carried, but fled in disorder." Five thousand or six thousand prisoners were taken, and the fugitives cut off from Lee's army. This caused a total loss of about 13,000 to the already weakened legions of the Confederate cause.

[1] Havelock, 82.

The battle of Five Forks virtually decided the fate of the war.

General Lee was now compelled either to evacuate Richmond and Petersburg and retreat into the western part of Virginia and endeavour to maintain the war there, or else to submit to be entirely invested and cut off from all communication with the surrounding country, which would in a very short time have necessitated his surrender from want of food.

He decided, therefore, to retreat in the direction of Danville, or, if that were impossible, then towards Lynchburg, where the mountainous nature of the country would give facilities for defence to his greatly over-matched army.

In this pursuit the cavalry performed the most important part, and it may fairly be said that Sheridan was able to cut off Lee's retreat solely from the fact of his cavalry being capable of dismounting and occupying and holding defensive positions. As these operations were conducted in a late war, and under the condition of very good firearms on both sides, the details will be instructive and interesting.

General Merritt moved with the cavalry in pursuit on the morning of the 3rd April, Lee having commenced his retreat the previous night. Merritt came up with the Confederate rear-guard at the Namozine Creek, where they had destroyed the bridge and entrenched themselves to defend the passage. He immediately forded the creek, and by a flank movement, aided by artillery, turned the enemy's position, and so compelled them to retire. The cavalry followed up the pursuit twenty miles, Sheridan with the 5th corps of infantry following them with all speed.[1] During the day the Southern rear-guard lost 300 prisoners, four guns, and two colours. At daybreak the pursuit was resumed, nine brigades of cavalry leading the way. The Southerners were overtaken at Bethany, strongly posted and fortified, and no attack could be made that night, but about 11 P.M. Sheridan, hearing that the enemy were retreating, resumed the pursuit, and at 6 A.M. on the 5th reached Jettersville, where they found the 5th corps of infantry, which had marched directly to that point. This cut off Lee's retreat towards Danville and forced him towards Lynchburg.

While Grant followed with the main army, Sheridan, in the advance, came up with the Confederate rear-guard, 10,000 strong, between Deatonsville and Sailor's Creek. And now occurred an extraordinary and original method of using cavalry in a pursuit. Sheridan saw that the force of the Confederate rear-guard was too great for him to be able to defeat

[1] Havelock, 90.

them by a direct attack. He decided therefore to move westwardly to get upon their flank, when the leading division of his cavalry was ordered to attack the flank of the train and the escorting column. As the enemy were strong in numbers, and splendid soldiers, this division could only delay and harass them on their march, but the other divisions moved on in rear of the line of dismounted horsemen which held fast and annoyed the enemy with their fire. Each division in turn attacked the column further on in flank, so that moving on successively Crook's, Custer's, and Devens' divisions swept ahead of the retreating column, crossed Sailor's Creek before them, and rapidly taking position on the high ground on the far side of the stream, they formed in line, dismounted, and placing themselves directly across the path of the enemy, with their firearms they disputed his passage.

The result of this manœuvre on the part of Sheridan's cavalry was the capture of sixteen guns, 400 waggons, and many prisoners. The strength of the position they had assumed, and the defensive power obtained by the effective fire of their dismounted men, with their long-range repeating rifles, enabled them to intercept on their retreat, and delay, until they were captured, three whole divisions of the Confederate infantry.

By the same method of tactics the pursuit was resumed, the retreat to Lynchburg cut off by wide turning movements of the cavalry, who, dismounted, checked the retreat, and so brought about the surrender of the whole of Lee's army at Appomattox Court House, on the 9th April.

Sir Henry Havelock's comments on this affair are well worthy of consideration, as the views of an officer of high training and great experience in the field. He says:—"The mode in which Sheridan, from the special arming and training of his cavalry, was able to deal with this rear-guard, first, to overtake it in retreat, then to pass completely beyond it, to turn, face it, and take up at leisure a position strong enough to enable him to detain it, in spite of its naturally fierce and determined efforts to break through, is highly characteristic of the self-reliant, all-sufficing efficiency, to which at this time the Northern horsemen had been brought. The practical experience of nearly four years of continual war, the entire and untrammeled confidence placed in good men amongst the Northern leaders, when they proved themselves to be so, and the complete freedom left them of devising and executing the improvements their daily experience suggested, had enabled Sheridan, and one or two more of similar bent of mind, to shake themselves free of

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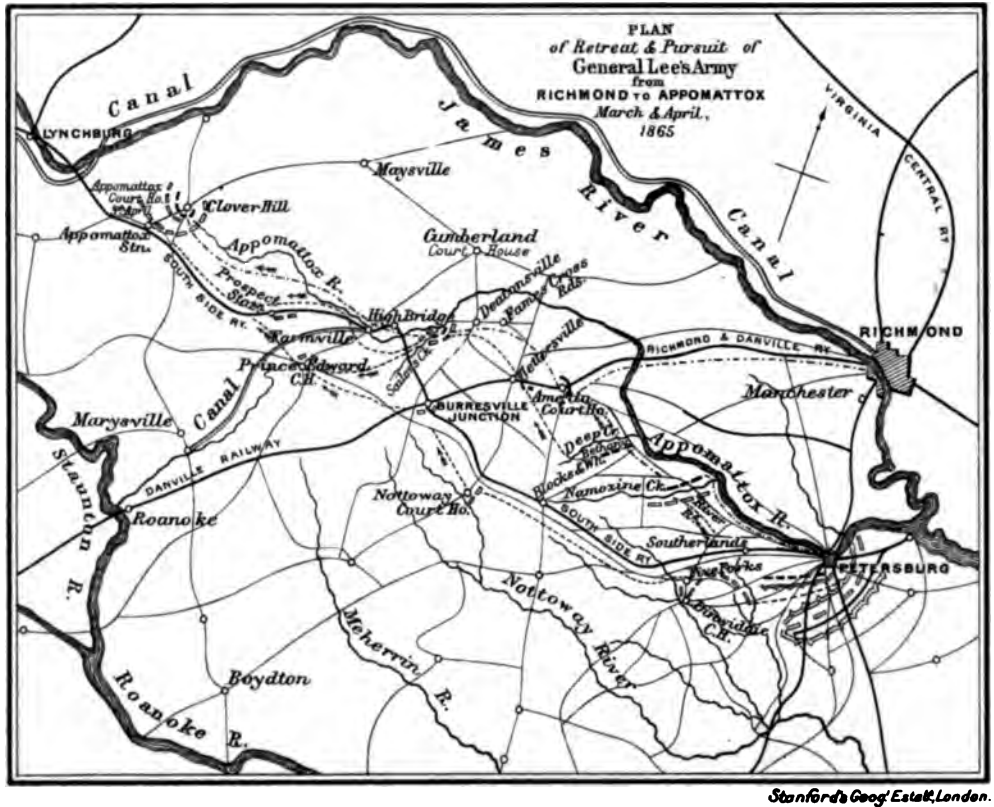

Stanford's Geog' Estabt, London.

London : Macmillan & Co.,Ltd.

the unsound traditions of European cavalry theory, and to make their own horse, not the jingling, brilliant, costly, but almost helpless unreality it is with us, but a force that was able, on all grounds, in all circumstances, to act freely and efficiently, without any support from infantry.

"Not only is there no European cavalry, with which the writer is acquainted, that could have acted the part now played by the force under Sheridan, but there is not on record, that he is aware of, an instance in the eventful wars of the last or the present century in Europe of a strong rear-guard having been thus effectually dealt with."[1] Again he says: "Had it been any European cavalry, unarmed with 'repeaters,' and untrained to fight on foot, that was barring the way, any cavalry whose only means of detention consisted in the absurd ineffectual fire of mounted skirmishers, or in repeated charges with lance or sabre, the Confederate game would have been simple and easy enough.

"They would merely have had to form battalion or brigade squares with their baggage in the midst; to have placed these squares in echelon so as to support each other, and then, advancing, to have steadily shot their way through the opposing horse. Who does not recollect Napier's celebrated account of the two squares, one composed of the 5th and 77th British regiments, the other of the 21st Portuguese, at El Bodon, breaking their way out, 'issuing unscathed, like the holy men from the Assyrian furnace,' through the surrounding clouds of Montbrun's splendid and eager French cuirassiers? What reader of military history but will at once recall the instance of the safe retreat of the English infantry for three miles over the open plain at Fuentes d'Onor, leaving 500 of these same chosen horsemen, who had vainly essayed to bar their progress, stretched prostrate on the field; or the similarly successful retreat of the Russian squares at Craône and at Rheims in 1814? The Confederate rear-guard, now under the veteran Ewell, were men who had shown themselves, in a hundred tried fields, from Bull Run downwards, to be soldiers fully capable of appreciating and following these well-known and brilliant precedents, had but the circumstances been similar. But not the men, but the times and the means were completely changed. The mounted rifle plan of fighting on foot from behind cover made the detaining fire of the Federal cavalry as galling and effectual as that of the best infantry; while by their method of the alternate passing on of mounted bodies in rear of their dismounted skirmishers, these mounted

[1] Havelock, 97, 98.

bodies again dismounting in selected positions further on in their turn, they were enabled to present to the Confederates an impenetrable hedge, constantly falling back, and thus avoiding actual contact, but unbroken, continuous, sheltered by obstacles of ground, and constantly emitting in their faces a fire most deadly in its precision and sustained rapidity. They were thus enabled always to keep ahead and always to present an impassable barrier to further retreat, while they themselves, from being completely covered, avoided any serious loss. The Confederates could not form square against them, because on this formation their 'repeating' fire would have told with tenfold effect."[1]

It must be remembered also that these arguments of Sir Henry Havelock are strengthened materially by the fact, that in the instances he mentions at El Bodon, Fuentes d'Onor, Craône, and Rheims, as well as in many other instances of like nature, the infantry were armed only with flint-lock muskets of short range and uncertain aim, while the Confederate troops had rifles of long range, of precision of aim, and great power of penetration. We may fairly assume that Sheridan, with his mounted riflemen, accomplished what regular cavalry could not have done, particularly when we remember that the ground was broken and intersected.

The accounts of actions contained in the foregoing pages serve to show, that in the American Civil War the contending parties had certainly originated and improved a system of working cavalry that was capable of producing great results. No one can read the accounts of Morgan's raids, of Forrest's expeditions, of Stuart's great sweeping reconnaissances, of Grierson's operations in Mississippi, of Wilson's invading army of cavalry, of Sheridan's turning movements at Petersburg, of his fighting in line of battle, of his pursuits, &c., without feeling that the mounted rifle principle had been wonderfully effective, and that it is the proper method of using horsemen under the improved state of projectile weapons.

The professional cavalry officer in Europe, wrapt up in the traditions of the wars of Frederick the Great and Napoleon, bearing in mind the failure of the dragoon principle in the seventeenth century, and holding it as a fixed principle that cavalry relying upon firearms are necessarily worthless, has never given the proper weight to the teachings of the American Civil War.

[1] Havelock, 99, 100.

It has been argued that the country was not suited to the use of cavalry proper, that the raw levies had no opportunities of becoming sufficiently trained to make mounted charges on a great scale, and it has been held that although mounted riflemen had been so effective, it was no proof that well-trained cavalry, upon the old principle, would not have done equally well, if not better. It seems to have been forgotten, that four long years of war, with constant drilling and fighting, must have produced as efficient troops as could be found. General Lee's army at Chancellorsville was as effective and well-disciplined an army as then existed in any part of the world, and the battle of Chancellorsville is strong proof of the truth of the statement.

Having therefore considered the part taken in the American Civil War by the cavalry, we will now proceed to consider the campaigns of 1866 in Austria, and 1870–71 in France, and see whether the results produced by the cavalry proper, on ground admirably suited to their use, and under the improved weapons, were such as to surpass in value those obtained by the new style of cavalry on the American continent.

CHAPTER XXIX.

THE AUSTRO-PRUSSIAN WAR OF 1866.

IN this campaign the cavalry in the Prussian army amounted to about 30,000 men, besides 7,200 in the depot squadrons. This force was composed, including the cavalry of the Guard, of ten regiments of cuirassiers of four squadrons each, armed with cuirass, helmet, sabre and pistol, fifteen regiments of Uhlans of the same strength, armed with lance, sword and pistol, ten regiments of dragoons, armed with sword and needle carbine, and thirteen regiments of hussars similarly armed.[1] The cuirassiers and Uhlans formed the heavy, the dragoons and hussars the light cavalry.[2]

The landwehr cavalry consisted of twelve regiments, six of heavy and six of light, armed and equipped like those of the regular army.

The Austrian cavalry had been somewhat reduced after the war of 1859, and, on the opening of the campaign of 1866, consisted of twelve cuirassier regiments, who were without the cuirasses, which had been abolished shortly before the war. These regiments were of four squadrons each, except one of five; and in addition, each had a depot squadron.[3] Two regiments of dragoons, fourteen of hussars, and thirteen of Uhlans, completed the force, which had an effective strength of about 26,621 men.[4]

The cavalry of the Italian army at this time consisted of four regiments of heavy cavalry of the line, seven regiments of lancers, seven regiments of light horse, and one regiment of Guides. All the regiments, except the Guides, had six field squadrons of 150 men each, besides a depot squadron. The effective force amounted to about 12,600 horsemen. The regiment of Guides consisted of seven squadrons, and had altogether 60 officers, 1,074 men, and 858 horses. It was not maintained for service in line of battle, but was chiefly

[1] Rustow, 37. [2] Hozier, 88. [3] Rustow, 24. [4] Hozier, 97.

intended to furnish the orderlies for the general officers. The heavy cavalry, as well as the lancers, carried the lance.[1]

In this war the cavalry did not exercise any important influence upon the result, nor did they render any valuable services in either army. We look in vain in the records of the war for great charges of cavalry in mass, such as were the striking features of most of Frederick the Great's battles, and of many of Napoleon's. No action, save that of Nachod, was won, or even partly won, by the charges of the Prussian horse, while the Austrian light cavalry, the successors of those who had enshrouded the great Prussian monarch in an atmosphere of pandours, and shut him off from all information, had so fallen back from their former reputation that they not only did not conceal the movements of their own army from the enemy, but actually were so negligent in watching the foe as to permit the Prussian Guard corps, at the battle of Königgrätz, to penetrate into the heart of the Austrian position, seize the key of it, and so secure the victory.

An attempt was made at the battle of Gitchin, by the cavalry under General Edelsheim, to check the Prussian advance, and endeavour, by a charge at speed, to change the fortune of the day in favour of the Austrians. The Prussians had occupied the village of Podultz, which had been set on fire by a shell just before they occupied it. Edelsheim, at the head of three of Austria's finest cavalry regiments, with desperate valour, made a dash at the burning village. The horses recoiled from the flames and smoke, and the force was obliged to retire with some loss. Afterwards the Prussians, pushing on in pursuit of their foe, were charged again by the Austrian hussars. The advancing Prussians did not form square, but received the charge in line, trusting to the rapid fire of their breech-loading needle-guns to secure to them the victory. Their confidence in their weapon was not misplaced, and the brave horsemen recoiled, with heavy losses, before the unceasing and pitiless storm of bullets which hurtled through their ranks.[2]

The combat of Nachod, on the 27th June, 1866, was opened by a cavalry fight between the Prussian Uhlans and dragoons and the Austrian cuirassiers, in which the latter were beaten, after a severe hand-to-hand struggle. It was a fight between lancers and swordsmen, and similar to the cavalry engagements of preceding centuries. The heavy men and horses in the Prussian ranks were able, by their greater weight, to press back the lighter Austrians, but the

[1] Hozier, 108, 109. [2] Ibid. 186.

details of the fight shed no light upon the effect of the modern weapons on cavalry tactics.

After the Austrians were defeated at Königgrätz, the effect of the modern firearms was plainly apparent. The retreating infantry were falling back at all points, from Chlum towards the south of Rosnitz, when the Prussian artillery and cavalry pressing on, began to harass them. The Austrian guns, covering the retreat, played upon the pursuing troops, and when the Prussian cavalry, excited by the victory, rushed with wild impetuosity against the retreating infantry—these, though running, still maintained their formation, and turned, when the horsemen came too close, to stand and deliver volleys, which drove them back with many a saddle emptied.[1]

The Austrian cavalry were near to cover the retreat, but were unable to charge the pursuing infantry, on account of the heavy fire which they could not face without risk of destruction; but when the enemy's cavalry pressed on, and so masked the fire of their guns and foot-soldiers, the Austrian horsemen charged boldly, and fighting desperately, sacrificed themselves to cover the retreat;[2] the charges swaying backwards and forwards as fresh bodies were thrown into action. There do not appear to have been any infantry broken by the cavalry on either side, the defeated and flying Austrian troops, halting and showing front if pressed too closely, were always able, with their deadly rifles, to keep off the pursuing dragoons.

The cavalry in both armies were well organised and equipped, and brave and gallant soldiers, as was proved by many of the skirmishes which took place, in which both sides charged at speed against each other, and fought with desperate energy at the closest quarters: as, for instance, at Saar, on the 10th July, and at Tichnowitz the next day. On the 15th July a gallant charge was made by Colonel Bredow's regiment, the 5th Prussian Cuirassiers, against an Austrian artillery train, on the road between Olmutz and Tobitschau. As this is an excellent illustration of a successful and well-devised attack, we will reproduce the details from Hozier's "History of the Seven Weeks' War":—

"Bredow, under cover of some undulating ground, formed his regiment in echelon of squadrons for the attack of the guns. The first squadron he kept towards his right, to cover the flank of his attack from any Austrian cavalry which might lie in that direction; the second and fourth squadrons he directed full against the front of the battery, and supported the second with the third as a reserve.

[1] Hozier, 251. [2] Ibid. 252.

"The squadrons moved forward in perfect lines, slowly and steadily at first, seeming to glide over the field, gradually increasing their pace, regardless of the tremendous fire directed upon them, which emptied some saddles. When within a few hundred paces of the battery, they broke into a steady gallop, which increased in rapidity at every stride that brought the horses nearer the Austrian lines. All the time of their advance the gunners poured round after round into them, striving with desperate energy to sweep them away before they could gain the mouths of the cannons. Rapid flashes of flame breaking from the mouths of the guns accompanied the discharge of the shells, which were being blurted forth with a nervous haste, through the thick clouds of smoke that hung heavily before the muzzles. The flank squadrons, trending a little away from their comrades, made for either end of the lines of guns, in expectation of finding there some supporting cavalry. The two centre ones went, straight as an arrow, against the guns themselves, and hurled themselves through the intervals between them upon the gunners. Then the firing ceased in a moment, and the smoke began to drift slowly away; but all noise was not hushed: shrieks from men cut down by the broad blades of the cuirassiers, cries for quarter, the rapid tramp of snorting and excited horses, the rattle of steel, shouts, cheers, and imprecations from the excited combatants rose up to heaven in a wild medley, along with the prayers which were being offered up by another armed host not many miles distant, at Brünn, where, on this Sunday, the army of Prince Frederick Charles was engaged in a solemn thanksgiving for their hitherto victorious career. Eighteen guns, seven waggons, and 168 horses, with 170 prisoners, fell into the hands of the Prussian force. A noble prize to be won by a single regiment! It lost only twelve men and eight horses, for the swelling ground, and rapid motion of the gliding squadrons, baulked the aim of the gunners, who mostly pointed 'their pieces too high, and sent their shells over the heads of the charging horsemen. Of the eighteen captured guns, seventeen were conveyed to Prosnitz. One was too much disabled to be moved.

"While the Prussian cuirassiers were engaged in drawing the captured guns to a safe place, a squadron of hostile cavalry deployed from Nenakowitz. Colonel Bredow placed himself at the head of his first squadron, and charged to cover the retreat of his regiment's spoils. This squadron dashed with a heavy surge upon the hostile ranks; the lighter Austrian horsemen, borne down and scattered by their pon-

derous shock, broke in wild confusion, could not rally, and were driven far beyond Nenakowitz."[1]

In this fight Colonel Bredow proved himself a dashing and efficient officer, and the above account of it contains in fact a volume of instruction, as to the proper method of attacking artillery. Here Colonel Bredow protected his flanks, held a reserve in hand, turned the flank of the guns, captured them and carried them off, and, by his foresight in keeping one or two squadrons in hand, was enabled to defeat an attempt of the enemy to rescue the guns. Had he thrown his whole regiment at once into the fight, the success could not have been any greater, while the chances were, that the fresh Austrian squadron coming down upon them while disordered by success, would have defeated them.

The most gallant charge of the war took place in the battle of Langelzalza, on the 27th June, 1866, where the Duke of Cambridge's Hanoverian regiment of dragoons dashed upon the Prussian retreating infantry and captured some prisoners. The heavy cavalry of the Hanoverian army made a most gallant charge, breaking two Prussian squares, and capturing a Prussian battery of artillery. The horsemen of Hanover, however, suffered fearfully from the deadly rapidity of the needle-gun.[2] These cuirassiers charged over several hundred yards of open ground, and their loss in killed and wounded was about one-third. This was the only instance of the kind during the campaign, and the Prussians were retreating when the attack was made.

This war occurred one year after the close of the American Civil War, but the experiences of that war seem to have had no effect upon the system of warfare in Europe. The little use made by Benedek of his light horse is a proof that he had not been much impressed by the struggle which had shortly before taken place in the New World. Although in its own country, among a friendly population, where every information might readily have been obtained, the Austrian cavalry had done but little service in acquiring knowledge of the enemy's movements. They had made no raids upon the Prussian flanks or rear, had cut off no convoys, destroyed no railway lines, cut no telegraphs, wearied and harassed no outposts, and, in fact, had neglected a great many duties that the mounted riflemen of America were continually and successfully performing.[3]

The Prussian cavalry in their outpost work had not yet learned the proper and effective method of covering the advance of an invading army. Their cavalry in this war

[1] Hozier, 374, 375. [2] Ibid. 279. [3] Ibid. 419.

regulated its movements by the march of the invading columns, and did not precede them to a very great distance; while the Austrian cavalry, as we have said, kept within a small radius, and without enterprise or dash only fought when they were attacked by the advancing Prussian horse. When the hostile cavalry did meet, when they did engage, no doubt they were well drilled, manœuvred steadily, and fought on both sides with the greatest gallantry; but can the reader compare the services of the horsemen on both sides with those performed in the United States, without admitting that the services rendered, and the results gained by the mounted riflemen in America, were not infinitely greater than those of the horsemen in Bohemia in 1866? Nor can anyone doubt that the American system was more suited to the improvements in the modern projectile weapons.

The war of 1866 was closed rapidly, with little campaigning, and with really only one decisive battle, so that the question of the effect of breech-loading weapons upon modern warfare was not fairly settled. In 1870–1871, however, a desperate war between France and Germany, in which both armies used the most improved firearms, gave an opportunity of testing practically a great many theories as to the proper system of tactics under the present condition of the art of war.

It will be of great value to us to study the results of this campaign closely, and see what lessons it teaches us on the important question as to the future method of employing cavalry in war.

CHAPTER XXX.

THE FRANCO-GERMAN WAR, 1870–71.

THE war between France and Germany in 1870 was the first occasion upon which the improved projectile weapons were used by trained armies on both sides; and consequently it is the only source from which we can obtain the information upon which to form a practical opinion as to the effects of their use upon the relative values of the various arms of the service.

Both the contending armies had large bodies of cavalry, carefully equipped and well drilled, although the proportion of horsemen to the other arms was less than in former wars, more through the great increase in the size of armies than from any diminution in the strength of the mounted force.

The French cavalry on its war footing consisted of eleven regiments of cuirassiers and one of carbineers, making twelve regiments of heavy or reserve cavalry. Thirteen regiments of dragoons and nine of lancers formed the cavalry of the line, while the light cavalry was composed of seventeen regiments of chasseurs, nine of hussars, and three of Spahis (a native African cavalry). The Guards regiments and the light cavalry had six squadrons each, one being the depot squadron. The other regiments had four field and one depot squadron each.[1] The entire strength on the war establishment was 40,000. This force was organised in brigades composed usually of two regiments, two or three brigades forming a cavalry division.

Each French *corps d'armée* of three or four infantry divisions had a division of cavalry attached, which was under the direct orders of the commander of the corps, so that the commanding officers of the infantry divisions had no horsemen under their immediate orders. This was different to the German system, which gave one cavalry regiment to each division of infantry. The want of a small mounted force was

[1] Borbstaedt and Dwyer, 126, 127.

on several occasions seriously felt by the French divisional generals, as, for instance, at Weissenberg, where General Abel Douay, with the 2nd infantry division of the 1st *corps d'armée*, had not even a quarter of a squadron of cavalry to reconnoitre his front, although well advanced and exposed to an attack, which a day or two afterwards ended in the complete rout and partial destruction of his division.[1]

In addition to the cavalry divisions attached to the French *corps d'armée* there was a cavalry reserve corps consisting of three divisions, making a total cavalry reserve of forty-eight squadrons, thirty guns, and six mitrailleuses.

The cavalry were armed as follows:—The cuirassiers had the sabre and pistols only; the lancers had the lance, the sabre, and the pistol; the light cavalry (chasseurs and hussars) as well as the dragoons were armed, besides their sabres, with chassepot carbines having a range of 800 paces.[2] These last, though really mounted rifle regiments, were practically cavalry, and were used mainly in that capacity, although there were several instances of their being used dismounted as infantry.

The North German cavalry consisted of ten cuirassier, twenty-one lancer (Uhlan), twenty-one dragoon, eighteen hussar, and six other light cavalry regiments. These seventy-six regiments had one depot and four field squadrons, or about 600 horses each. The cuirassiers and lancers were heavy cavalry, all the others light. The total cavalry of the German army, including the South German troops, amounted to 369 squadrons, or about 56,000 men.

The organisation was different from that in the French army. The German infantry divisions had each a regiment of cavalry attached, while the remainder of the cavalry were organised in divisions and distributed through the different armies. There was no *corps d'armée* of cavalry as in 1866, the division organisation being found to be the most convenient. Each of these cavalry divisions, which consisted usually of two brigades of two regiments each, had one battery of horse artillery attached.

From the very outset of the war of 1870 the superiority of the Germans in organisation and military capacity was plainly shown. The wars of the Great Napoleon, followed by the successes in the Crimea, and more particularly in 1859 at Magenta and Solferino, had led the French to believe that they were invincible, and caused them to rest upon their laurels without taking the proper care to keep up with the improvements in the military art. The experiences of the

[1] Borbstaedt, 256. [2] Ibid. 151.

Civil War in America had taught no lesson to the French, they considering, as the armies there were not originally formed of professional soldiers, that the teachings of the campaigns could be of no value.

They seemed to forget that four years of continual fighting in the field with varying success would produce professional soldiers of the highest type, men whose practical knowledge of the business of war would be greater than if their whole lives had been devoted to peace training. The French, therefore, had gained no advantage from the example of the system of working cavalry that had been in use in America; and consequently from the very first their outpost service proved an utter failure, and their horsemen, though brave and gallant soldiers, were so badly handled, and their employment so little understood, that they were uselessly sacrificed at Wœrth and Sedan to no purpose.

Nothing stands out in greater relief in the account of the war of 1870 than the shameful inefficiency of the French in their outpost service. It was either absolutely neglected, as at Beaumont, or else so wretchedly performed, that it was a common thing during the campaign for French troops to be surprised in their encampments in broad daylight. The German cavalry four years before had been opposed by the Austrian horsemen, whose outpost work was also very inefficiently performed. The Germans consequently gained more boldness in carrying out their reconnoitring, and immensely aided by the miserable incapacity of the French light cavalry, in the minor operations of war, were able to perform the most important services from the commencement of hostilities by untiring watchfulness and far-reaching reconnaissances in every direction.

The impunity with which the German patrols were permitted to roam through the enemy's country, and even in rear of their lines, led to the boldest and most adventurous rides on the part of very small bodies of horsemen, who were able to gather and carry back the most important information as to the enemy's position and movements. The careful and diligent instruction that had been given in peace time to the German troopers in this most necessary duty was of great service to them when called upon to act in earnest in the field.

On the night of the 23rd to the 24th July a Prussian patrol of Uhlans penetrated the French lines and blew up a viaduct of the French railway at Saargemund, and from this time the Prussian cavalry began to show their superiority. On the 26th July a Wurtemberg staff officer, Count Zeppelin, with a

small patrol of four officers and four privates, succeeded in making his way through the French outposts near Lauterburg, and rode for thirty-six hours through the whole of that district. The party were surprised in the Shirlen Hof, a small inn south of Wœrth, and ten miles in rear of the French outposts. Count Zeppelin managed to escape, and carried back information of great value in arranging for the advance of the Crown Prince's army a few days after.

The French at this time did nothing with their cavalry; in fact, General Abel Douay, with the second infantry division, had no cavalry, and, thrown forward in an exposed position, was virtually surprised at Weissenberg, and overrun by the well-covered advance of the Third Army. This gave the first success to the Prussians, and two days afterwards, at Wœrth, the French right wing, still unprepared and dispersed, was badly beaten by the advancing Prussians. The French fought bravely and well in both these actions, but were surprised and greatly outnumbered.

At the battle of Wœrth, however, a charge of French cavalry was made by Michel's cuirassier brigade, from the right wing of MacMahon's position, against the Prussian left, which was steadily advancing through Morsbronn, and threatening seriously to turn the flank of the French army. This body of cavalry, 1,000 strong, in three lines, advanced over difficult ground towards Morsbronn. They braved the musketry fire which at once opened on their left flank, and rushed on to strike the Prussian infantry, while forming after their advance. These troops received the attack, however, just as they stood, without forming either battalion or rallying squares, but in those formations which enabled them to use their fire to the greatest advantage. In a few moments the cuirassiers suffered fearful losses. The remnants charging past, tried to gain the open ground, and many were captured, very few cutting their way through and escaping by a wide detour. After running the gauntlet of the fire of the infantry and suffering terrible losses, the broken remains of the brigade had a sharp hand-to-hand fight with a Prussian hussar regiment which they met in their way. Michel's brigade and the 6th French Lancers, which charged with them, were almost destroyed; very few of them again reached the army. The Prussian hussars lost one man killed, twenty-three wounded, and thirty-five horses. The losses of the infantry were very inconsiderable.

This sacrifice of the cavalry brigade served no other purpose than to gain time for the retreat of the French right wing. The charge was gallantly made, the men rode boldly

on, there was no hesitation, and yet the fire of the infantry, who, it will be remarked, relied solely on their needle-guns, and did not even form square, was sufficient to defeat and destroy them. We shall find other examples in this war of the little chance cavalry have of successfully using the old system of cavalry tactics.

After the battles of Wœrth and Spicheren the French, discouraged by their defeats, were obliged to retreat rapidly in different directions, the *débris* of the right wing, under MacMahon, moving by a wide detour to the south around to Chalons, the remainder of their army falling back upon Metz.

It was in the advance of the German armies at this time that the cavalry shone out so brilliantly, and proved that, although great improvements had been made in the weapons of the other arms, and the chances of success for cavalry on the battle-field much diminished, there was still a wide field of usefulness open to it, when skilfully handled.

The cavalry at once pressed forward one or two days' march ahead of the main body of the infantry, keeping the enemy constantly in view, and, spreading far and wide over a great extent of territory, formed an impenetrable curtain or veil, which screened the movements of the main army, and enabled it to march at ease and with perfect confidence under the shelter so secured. These duties were performed in the most admirable manner, with boldness, energy, and skill, and proved conclusively the enormous advantage to an army of a superior and well-managed body of horsemen.[1]

When most nations had been reducing their cavalry, in the opinion that its sphere of usefulness was gone, the Prussians, and the other North Germans, had strengthened rather than reduced the arm, and had kept steadily in view the great value of a mounted force.

These wide-spreading detachments of horse completely hid from the French generals all knowledge of the positions and designs of the Prussians. Patrols and small parties of Uhlans and hussars seemed to show themselves from almost every point of the compass, and it was impossible to discover from behind which portion of the moving veil of horsemen the dense masses of the Prussian invading host would burst forth to attack.

The German *corps d'armée* marched some twenty or thirty miles in rear of these advanced posts in perfect freedom, and without the slightest risk of being delayed by the sudden

[1] Borbstaedt, 352.

appearance of hostile detachments in front or flanks. The horsemen meanwhile swept forward, pressed MacMahon far south of Metz, and occupied the whole country between his troops and Marshal Bazaine. They soon reached the Moselle. Nancy, the capital of Lorraine, surrendered on the 12th August to six Uhlans, who were soon followed by a larger party. The line of the Moselle was occupied by the cavalry nearly down to the walls of Metz. And these bold and dashing exploits of the German horsemen were the absolute cause of preventing very considerable reinforcements from MacMahon joining the main army.

The Germans then having crossed the Moselle, near Pont-a-Mousson, the cavalry in large force swept northward to turn the right flank of the French army around Metz. By this time it was clear that the French purposed retreating upon Verdun, and it became important to interrupt, and, if possible, cut off their march. The main forces of the Prussians were still far to the rear, but pressing on by forced marches. The cavalry, well advanced, were endeavouring to hold the enemy in check until the arrival of the infantry of the main body. On the morning of the 15th August, the Prussian advanced horsemen struck the Metz-Verdun road, and were able to hold in check the French cavalry, and practically to delay the retreat for nearly twenty-four hours. General Forton's cavalry division, which formed the advance of the French army in their march, came across Von Redern's brigade of the 5th Prussian cavalry division, with a battery of horse artillery. This small force of horsemen maintained a bold front, and, by an artillery fire, checked the march of the whole southern column of the French army. The inefficiency and want of dash on the part of the French horsemen was here very marked, for General Forton had a sufficient force of cavalry to have easily brushed the small Prussian brigade out of the way and enabled the march to be continued. Instead, however, of pushing forward, he fell back towards Vionville, and practically the fate of Bazaine's army was then sealed.

The next day the German infantry divisions, by hard marching, began to come up one after the other, and, by severe fighting at Mars-la-Tour and Vionville, were able to check the French, who were again attempting to get away. This threw them back upon Gravelotte, where the greatest battle of the war resulted in Bazaine's investment in Metz, where he subsequently surrendered.

At the crisis of the battle of the 16th August, at Vionville. the French forces, which at first greatly outnumbered the Prussians, were pressing on in great strength, and the ex-

hausted troops of Alvensleben were threatened by a vigorous attack, near Vionville and Flavigny, by the French 6th Corps, under Marshal Canrobert. Alvensleben had no reserves of either infantry or artillery, and decided that his only hope was to check the attack by a charge of cavalry. This charge was made, avowedly as a sort of last resort, with the knowledge that the men would be sacrificed. General Bredow commanded the brigade, which consisted of three squadrons of the 7th Cuirassiers and three of the 16th Lancers. He charged in one line, but from the delay of the 16th Lancers in deploying, the charges took place, unintentionally, in echelon. Under a heavy fire of artillery they rode onward, the guns were soon reached, the gunners cut down; and then on rushed the horsemen, at full speed, upon the lines of infantry in the rear, who received the charging squadrons with volleys of musketry. The lines were broken with a rush, sabre and lance doing deadly execution. Excited by the success, carried away by the impetuous fury of their charge, they could neither be rallied nor re-formed. A number of mitrailleuse were taken, when suddenly the scattered horsemen were pounced upon, in their disorder, by the French 7th Cuirassiers, and some Spahis and Chasseurs. In their hurried retreat they were very badly handled, and suffered great losses; but the sacrifice was well repaid, as it checked the attack of the French 6th Corps, which would otherwise have been fatal. This was the boldest charge of the war, and the only one that was to a certain extent successful.[1]

A charge by the 1st Dragoons of the Prussian Guard, made later in the day to relieve Wedell's brigade, was unsuccessful, the fire of the unbroken French infantry driving them back with heavy losses.[2] Shortly after General von Barby, with six regiments of cavalry of the Prussian left, charged ten regiments of French horse, under General Clerembault, who, strange to say, received the onset with a carbine fire on the open plain. The Prussians disregarding it fell on vigorously with the sabre, and the short hand-to-hand struggle was soon settled in favour of the Germans, whose superior weight and horsemanship made them more than a match for their opponents.

The battle closed just as it got dark by a charge of the 6th Prussian cavalry division, in which Rauch's brigade of hussars broke some French infantry squares. This was caused by the darkness concealing their approach until they were close. A violent fire, which was poured upon them from all quarters, compelled the rapid retreat of the division.[3]

[1] Borbstaedt, 405, 406. [2] Ibid. 415. [3] Ibid. 420.

The battle of Gravelotte was almost exclusively one of infantry and artillery, and gives no examples of cavalry tactics.

In the subsequent operations between the 18th August and the battle of Sedan the contrast between the cavalry of the two armies and the method in which it was used was still strongly marked. MacMahon was obliged, at the dictation of the Government in Paris, to make a detour to endeavour to relieve Bazaine and effect a junction with him. This scheme was feasible only if skilfully and secretly carried out, and its success depended upon the design being concealed from the enemy. Here was an opportunity for the French cavalry to have retrieved their reputation and materially aided their army, but they failed signally in every particular.

They were very unskilfully handled. It is manifest that the only possible chance of success was for the French cavalry to have been thrown in all its force to the right flank of the army, there to have spread in a long line of small posts supported by reserves, so that a veil would have been thrown over the operations of the French army, which could have marched freely and rapidly under such a cover. The concealment of the French march for one or two days would have improved their chances of success immensely. Instead of this, however, there were as many horsemen almost upon the French left as upon its right, many more in front, and many also scattered under the control of the commanders of the infantry *corps d'armée*.

In fact, half the reserve cavalry had been at first placed on the right to cover the movement, but on the 25th August it was moved forward to Le Chêne, leaving the whole flank of the French line of march exposed in the only direction from which an attack could come, while Bonnemain's reserve cavalry division was uselessly idling on the extreme left, where an attack could not possibly have been expected.[1] The French army consequently moved north-eastwardly with only the cavalry attached to the infantry corps to guard the flank.

The result was as might be expected; the Germans soon discovered the change in the French plans, and the whole invading army wheeled to the right and marched against them. Impenetrable clouds of horsemen spreading far and wide in front hid their march, and soon enormous hosts of infantry were close upon the flank and rear of the French columns, who moved on in blind confidence, neglecting the simplest precautions.

[1] Bonie, 111; Borbstaedt, 516.

The blow fell first on the 30th August upon the 5th French Corps, under General de Failly, which was encamped on the north of Beaumont. From some unaccountable cause the French had entirely neglected to send out cavalry to reconnoitre the woods south of Beaumont. This was the more inexcusable as they had every reason to believe that any attack was likely to come from that direction.

The Prussians moving up under cover of the woods approached close to the camp, and could plainly see the French troops cooking and lying scattered about without the slightest suspicion of their danger. The German shells suddenly bursting among them was the first notice of an attack which was vigorously made and entirely successful. The French artillery had no time to harness their horses, and so their guns were taken, and all their tents, baggage, and stores captured.[1]

This was the prelude to the final disaster at Sedan. In this last action under the Empire the cavalry again proved that they did not lack the courage which has always distinguished the French soldiery. Toward the close of the battle General Ducrot wished to make a last desperate effort to arrest the enemy by a grand cavalry charge, and following it up, to break through his lines. General Margueritte, with the Reserve Cavalry division, was to have made the charge, and having broken through the enemy's position, was to wheel to the right and roll up their lines in that direction. The 2nd Reserve Cavalry division, under Bonnemain, was to support this attack, while the several regiments of divisional cavalry of the 12th Corps were massed together and brought forward to act as a reserve.

The whole force moved forward to attack; they swooped down like a whirlwind, threatening to overwhelm the Prussian infantry who were advancing to the attack. The charging horsemen soon burst through the skirmishers and pressed on towards the German battalion, which, in deployed lines and steady formation, received them with a perfect tempest of bullets from the swift-loading needle-guns. Every effort to bear up against such a fire failed. The horsemen, though bravely striving and gallantly returning to the attack, were mown down in such numbers as to leave piles of the dead and dying men and horses all along the front of the Prussian lines. The whole affair was a useless and terrible sacrifice of brave men.

The writer received a letter shortly after the battle from a distinguished officer of much experience who took great

[1] Borbstaedt.

pains to inquire into the facts of this attack. The details are well worth reproduction. He says :—

"The question of cavalry charging infantry with breech-loaders is, I think, settled conclusively by this campaign. Wherever it has been tried by the 8th and 9th French Cuirassiers at Wœrth, by the 7th Prussian Cuirassiers at Vionville on the 16th August, or by the two French light-cavalry brigades on their extreme left at Sedan, the result has been the same—a fearful loss of life with no result whatever.

"General Sheridan was an attentive eye-witness of the four charges made by the French light cavalry at Sedan, and gave me a most minute account of them. I examined the ground most carefully only thirty hours after, while the dead men and horses all lay there, so that I formed as correct an idea of it as if I had seen it. The first charge delivered by the 1st French Hussars was made under the most favourable circumstances possible. They were very well handled. As the Prussian infantry skirmishers in advance of the main body came over the hill behind which they had been waiting, they were led round under cover of the brow till they got completely *in rear* of and on the right flank of the skirmishers. They thus got within 100 yards of them before they were seen, and then charged most gallantly, charging down the whole line. But even under these advantageous circumstances the charge had no result worth speaking of. The Germans ran into knots and opened fire ; a very few who ran to the rear—say twenty-five or thirty—were cut down. On the other hand, the fire of these clumps and rallying squares completely destroyed the hussars. The two rear squadrons wisely swerved off and regained the shelter of the hill. Those who went down the line were all killed, wounded, or driven down on the Prussian side of the slope into a village and there captured. It did not delay the advance of the Prussian infantry five minutes. The succeeding charges made by the 1st, 3rd, and 4th regiments of Chasseurs d'Afrique and the 6th Chasseurs came to nothing, though they were most gallantly and perseveringly made. The Prussians simply waited for them in line till they got to within 150 yards, and then just mowed them down with volleys—they were shot down before they could get within fifty yards. It was a useless, purposeless slaughter. It had, practically, no result whatever. The hill-side was literally covered with their dead and the bodies of their little grey Arab horses. These two brigades of five regiments must have lost quite 350 killed, besides their wounded and prisoners. There can be no greater scandal than to say they did not charge home.

General Sheridan assured me they behaved most nobly, coming up again and again at the signal to charge.

"They were sheltered from fire till the last moment, were carefully handled, and skilfully and bravely led. The ground they charged over was not more than 400 yards, yet the result was virtually their destruction as a military body without any effect whatever.

"I took great pains to ascertain the facts. A friend of mine whom I had known in Africa ten years before, was a major commanding two squadrons of one of these regiments. He showed me the roll of his two squadrons with each man's name marked off. The result was 58 men of all ranks left effective out of 216 that went into action. The whole time they were under musketry fire must have been less than a quarter of an hour."

After the battle of Sedan the war mainly centred in the two great sieges of Paris and Metz, the cavalry still doing good service in keeping up the communications and covering the operations. Several instances occurred in the operations in the provinces of France of successful actions of cavalry, but they were all on a small scale. At the battle of Amiens some German squadrons rode down a battalion of marines and captured several guns. The 4th German Hussars also captured a battery at the battle of Orleans and carried it off, while the 11th Prussian Lancers also took a French battery at Soigny. These successes won on the battle-field were not proportionate to the large mass of cavalry, nearly 70,000 strong,[1] which the Germans brought into the field.

Early in the siege of Paris the French had organised small partisan corps under the name of "*Franc tireurs*." When these *Franc tireurs* became numerous the Uhlans could no longer move freely to great distances, but were almost always accompanied by battalions of infantry, who marched with them to clear villages and obstructed country of these volunteer riflemen, who fought with great bravery.

This proves conclusively that the great successes of the Prussian horse in the early part of the war were to be attributed more to the extraordinary inefficiency of the French cavalry, particularly in the way they were used, than to any wonderful superiority in arms or organisation of the celebrated Uhlans.

The system of attaching infantry to the cavalry necessarily deprived the horsemen of their speed, and clogged them so that the whole force in point of mobility was only equal to the same number of foot-soldiers. In fact, the great value

[1] Borbstaedt, 93.

of cavalry, its speed, and far-reaching power, was gone the moment it had to march under the protection of infantry.

A careful study of the method of arming and employing cavalry in the American Civil War should have shown the Germans that if their horsemen had been armed with rifles or carbines they could have done equally well or better all that they performed in the early part of the war, and would have been fully capable of coping with all the "*Franc tireurs*" that they were likely to meet in detached warfare.

In America, the mounted riflemen were continually taking towns and villages, although well defended by infantry and artillery. The "home guards," which represented the same type of force as the "*Franc tireurs*," never checked the onward and rapid progress of the Southern horse, who would have ridiculed the idea of being delayed and hampered by conforming to the march of infantry in a raid or partisan operation.

The experience of the Franco-German war is very remarkable on this point, for the brilliant exploits of the Prussian cavalry in the beginning of the campaign would lead one to expect that they would not have been much embarrassed by the opposition of such undisciplined and irregular troops. This is the most striking lesson that the war after Sedan affords to the cavalry officer, and it requires very little thought to perceive the weak point and the remedy for it.

This was the last great war from which we can obtain information as to the cavalry operations of the future. As I am writing, a struggle is going on between Turkey and Servia in reference to which one can only get vague and inaccurate accounts from the public press, so that it is impossible at this moment to say whether the fighting contains any useful experiences. The horsemen, as far as can be discovered, have exercised no important influence as yet. The following extract cut from a newspaper, if true, is a good illustration of the value of the revolver, and worthy of perusal:—

"In the battle of Saitschar, a Servian officer, Captain Frassanovitch, distinguished himself greatly. He took his sabre in his teeth, and, revolver in hand, charged through a Turkish demi-battalion, captured the colours and carried them off, leaving a dead or wounded Turk behind him for every barrel of his weapon."

We will here close the historical sketch of the cavalry service. We have traced the force from the misty periods of the most remote antiquity, through all the changes and vicissitudes of the intervening centuries, down to the present

day. Its gradual development to its present condition we hope we have made clear to the reader. It will fitly conclude our labours to consider in the light of the experiences of the past and the knowledge of the present, what may be the best system of organisation, armament, and employment in war of the horsemen of the future.

PERIOD VI.

THE ORGANISATION, ARMAMENT, AND EMPLOYMENT OF CAVALRY IN MODERN WARFARE.

CHAPTER XXXI.

CHARACTERISTICS OF CAVALRY.

THE cavalry service from the earliest period, when the horse was used simply to convey the chief warriors to the battle-field, down to the present time, has been marked by certain peculiarities which have distinguished it from the other arms.

The speed of the horse, and the impetuous spirit that the constant habit of riding seems to impart to the horseman, have in all ages caused the cavalry service to be noted for its dashing and chivalrous temperament. While steadiness and solidity have marked the infantry and artillery arms, boldness and vigour have characterised the cavalry.

At first, the speed only of the horse was used, the warriors dismounting to fight on foot; soon the idea arose of employing man and horse as a projectile weapon, so to speak, and hurling them at speed upon the enemy's flanks. For many ages this was the regular method of employing horsemen, and it can readily be perceived that, under such a system, cavalry could not act upon the defensive, but were obliged to act always offensively. The result was that while infantry could operate upon any kind of ground, could attack or defend with equal facility, the cavalry could only act upon level and unobstructed country, and always upon the move: cavalry proper could never assail strong positions, if covered by obstacles, and could not resist an attack at the halt.

These facts led to the employment of infantry in great numbers as soon as the introduction of fire-arms and pikes

gave them a chance of defending themselves against the onset of charging horsemen.

The great value of cavalry in outpost and detached service, on account of their mobility and speed, always, however, kept up their reputation and rendered necessary the maintenance of large bodies in all armies. For this service they have always been pre-eminently qualified, no matter how armed or equipped, or against what enemies they have been opposed. The light horse of the Greeks, of the Persians, of the Romans, all were of great service in outpost duty, as have been all good light cavalry in every age and under all the changing conditions of warfare, from the time that the Assyrian charioteers began to mount their chariot horses, down to the period when the Prussian Uhlans spread terror far and wide through the fields and country villages of France.

In this important characteristic their fitness for scouting, reconnoitring, raiding, &c., cavalry have always been the foremost arm and without rival. In covering an advance, in pursuing a retreating foe, their capacity has always been unequalled, but upon the battle-field there has been a constant and unceasing struggle, which, with varying success, has been, and probably may be, carried on continually.

It is curious to trace, as we have in the preceding pages, the ever-varying conditions which have given success now to the cavalry and now to the infantry, with an almost impartial uncertainty.

The infantry in the earliest times were the only force and the mainstay of armies. The charioteers soon began to assume a superiority, and for a time formed an important item in the military systems of states. Then the cavalry, under Alexander the Great, used on a new system, hurled with unaccustomed speed upon the enemy, won successes which gave them for a time a dominating influence.

The Roman infantry long held the highest position, till the successes of Hannibal's cavalry again turned the scale in favour of the horsemen. Improvements in drill and steadiness, and careful measures taken to meet with the best advantage the horsemen of Pompey, led under Julius Cæsar to another revival of the prestige of the Roman infantry. Laxity of discipline, the corruption and luxury of the Roman infantry, produced, as we have seen, under the Empire, a demoralized army that succumbed to the barbarian horse and again caused the belief that cavalry alone were of service on the battlefield.

The introduction of feudalism and the growth of chivalry led to the exaltation of the cavalry force and the abandon-

ment of the use of infantry, until the English archers and Swiss pikemen had invented a method of meeting the armies of the age, and with bows, arrows, pikes, and subsequently fire-arms, had learned to beat off the charges of the mailed chivalry.

Again the horsemen rallied from the blow, and ingeniously contrived a plan that, for the time, restored to them the advantage. They could not force the serried pikes, which formed an impassable obstacle to the use of their "*armes blanches*," and under this protection the infantry were able to fire at them with some effect from their arquebuses. To meet this the horsemen strengthened their armour, and being carried, were able to wear it of such weight as to be a considerable protection, and then, taking the infantry weapon, the petronel or arquebus, they rode up, protected themselves, and fired into the squares of the poorly-defended infantry.

This again maintained the prestige of the mounted forces, until fire-arms became so powerful as to render armour useless. It was gradually lightened, and the horsemen carried on their fighting by rank after rank firing their pistols at close range until an opening was made, by which they could disperse and then cut down the foot-soldiers. The infantry were for a time after this masters of the situation to a great extent until, not valuing the cavalry at its full worth, and seeing the great advantage of the fire, they invented and adopted the bayonet as an inefficient substitute for the pike, calculating that the increased fire would counterbalance the loss of the difference between the pike and the bayonet as a defence against a charge. The bayonet alone was never in itself a sufficient defence against a well-directed charge of cavalry, and we do not believe that a body of infantry ever existed that with the bayonet alone, unsupported by fire, could have checked the determined charge of good horsemen.

This was the system when Frederick came upon the scene. Everything had paved the way for great successes by good cavalry. The infantry well drilled, accustomed always to fight upon the most level and unobstructed ground that could be discovered, armed and trained to resist a system of cavalry tactics of a slow and clumsy kind, were naturally soon overcome when charged impetuously by masses of well-drilled and well-led horsemen. The wars of Frederick and the constant and brilliant successes of his cavalry gave that arm a high reputation; and the infantry making no change and discovering no new scheme or weapon to regain their superiority, the result was that in Napoleon's wars cavalry exercised a most important influence on the battle-field. So

matters stood until the rifled fire-arm was invented; then came the discovery of the breech-loader, with its length of range, its precision of aim, its marvellous and terribly destructive rapidity of fire.

The change has now been made in favour of the infantry, and the whole experience of the past shows that it is useless for the cavalry to look back upon the history of bygone ages and claim that cavalry must succeed because they have succeeded. We must rather do as our predecessors have done, give up attempting to apply an old and exploded system of using cavalry now that the conditions which alone made it so successful in the past have all changed.

When, in the sixteenth century, the discovery of fire-arms and the use of pikes gave the infantry so great an advantage, the horsemen of that day took two measures to apply to their own service the weapons that were so deadly in the hands of their opponents. One method was a recurrence to the earliest use of the horse in war—it was to arm soldiers as infantry, and to use the horse only for the purpose of rapid locomotion. Thus dragoons were formed and used for many generations. The other system was the riding up and firing with pistols into the faces of the infantry soldiers. When we come to treat of the organisation of the cavalry for the future we will consider fully the best reforms to enable cavalry to gain the greatest advantage from the modern method of fighting.

As to the characteristics of the arm when cavalry are fighting against cavalry, it is a peculiar characteristic of the force that the side which brings the last reserve into action is most likely to be successful. Thus it is necessary for cavalry always to keep reserves in hand. Cavalry is never weaker or easier to overcome than immediately after a success. The men and horses are blown, the lines disordered, confusion reigns paramount, orders are not heard or attended to, and a fresh force falling upon it in that state will invariably put it to rout.

Cavalry is always dependent upon the condition of the horses. If they are not in an efficient state, if their shoes are not carefully looked to and sore backs guarded against, they are destroyed, and the force becomes worthless.

Another peculiarity of cavalry is that it should never surrender, at least in a country at all open. This is one of the best established maxims of the force. It should always attempt to cut through, or if that is impossible, by scattering to elude pursuit. Herein it differs from the other forces, who are only supposed to escape if they can. The

anecdote, related in the twentieth chapter, of Seidlitz jumping with his horse off a bridge, is a good illustration of this principle.

Cavalry is a very difficult arm to handle in the field; it easily gets out of hand, and becomes dispersed. It can only be employed mounted, where the ground is favourable. Cavalry proper is not suitable for defence, and can only resist an attack by making an anticipatory onset. Its reputation is not affected by a repulse, for cavalry that has been overthrown and driven off the field in confusion has often rallied and reappeared confident and victorious.

Cavalry is as necessary to cover the retreat of a beaten army as to pursue an enemy when victorious. The charge of cavalry should be rapid and unexpected, and must be made with confidence and pushed "home." When the order to charge is once given, caution should give way to impetuosity.

Cavalry-men require to be more intelligent and better drilled than in the other forces. On outpost duty, patrolling, and reconnoitring, the men are often obliged to be self-reliant and to use their own judgment. This does not occur to anything like the same extent in the infantry or artillery.

CHAPTER XXXII.

ORGANISATON OF CAVALRY INTO DIFFERENT KINDS.

SECTION I.—CAVALRY OF THE LINE.

IT is plainly apparent to the thoughtful observer of the progress of the military science during the last twenty years, that the vast improvements in modern weapons have to a great extent changed the conditions of warfare, and that the sphere of the cavalry service has been much narrowed upon the battlefield, and its chances of success considerably diminished. The system of Frederick the Great has served its purpose, and it is left to our arm now to look about and devise a new system to suit the present state of affairs.

The experiences of the last war in France have established a few points very conclusively. In the first place, it has been shown that the bravest cavalry, charging in the boldest manner, are almost certain to be cut to pieces by the terribly destructive fire of the breechloading rifle. The Prussian infantry, confident in the power of their weapons, met the charging horsemen of France in line, and drove them back with their fire alone. At Wœrth, at Mars la Tour, at Sedan, no matter by which side the charge was made or by which infantry received, the result was equally disastrous to the cavalry.

At Wœrth the French cuirassiers, who charged with great bravery, were cut to pieces; but their charge was not altogether in vain, for it checked the Prussian advance and materially covered the retreat of the French army.

At Vionville the charge of Bredow's cuirassiers was almost fatal to them, but it must be counted as a success, as it checked an attack that otherwise would in all probability have defeated the Prussian army, and thereby mainly contributed to the victory. A great sacrifice was undoubtedly made, but the result well repaid the losses. These were the only successful charges of cavalry of any importance, while the totally unsuccessful charges were very numerous. For

example, about noon on the 16th August, at Flavigny, near Vionville, General Frossard ordered General du Prenil to charge the Prussian lines at once, or that all would be lost. The charge was made gallantly in two lines. They rode boldly on, but were mown down in such numbers that they were thrown into disorder and repulsed. The losses of the French cuirassiers were 22 officers, 208 men, and 243 horses killed or wounded in a few minutes. The losses of the infantry in the same affair *absolutely nothing*.

The charges at Sedan teach the same story—tremendous losses for the cavalry, and no result. The lesson the war of 1870-71 teaches, therefore, is, that at the cost of immense loss of life, and probable destruction of the cavalry force, time may be gained, an attack checked at the critical moment, and the fortune of the day turned while trembling in the balance; and of course, if a victory is won by the sacrifice, it is worth the cost. But the conditions of modern warfare are such that the occasions when these sacrifices may be demanded are likely to be rare, and the opportunity of using them to advantage seldom met with. The action of cavalry on the battlefield, especially on the old system, has consequently been very much narrowed.

Still, however, the occasions will arise in which cavalry may be thrown into the field to charge infantry or artillery, and therefore all armies should have a certain proportion of cavalry proper, trained, equipped, and organised, with that object in view.

Taking that as admitted, we may conclude that one-fourth of the cavalry should be of that type, and then the question arises as to how it should be armed, equipped, and organised.

The idea naturally suggests itself, whether some use might not be made of the great improvements in weapons, so that the cavalry could apply to their own use some of the new inventions. The horsemen did this with advantage for a time on the introduction of firearms, and although subsequent changes rendered a recurrence to the arms and system of Alexander the Great judicious, it is no proof that at the time the knights adopted the petronels it was not the best course for them to pursue.

The first idea would be to arm the cavalry with the same deadly weapon, the breech-loading rifle, but as it is a weapon requiring careful and steady aim, and an accurate adjustment of the sights, it is manifestly quite unfitted for use by mounted men, especially as the dragoon stands boldly out, both man and horse, an open and clearly exposed target for the crouching foot-soldier, who could hardly be discovered by the horseman

at any considerable distance. The use of the rifle from the horse's back must therefore be considered as an expedient *never to be resorted to under any circumstances either against cavalry or infantry.* We may, therefore, confidently assume that for cavalry to be used as cavalry, for charging, they can gather no assistance from the improved rifle.

Then comes the other expedient, the use of the revolver; and here we see some chance of aid to the horsemen. We will, therefore, consider what arguments there are in favour of the use of the revolver by cavalry in the future.

The invention of this arm has given to the cavalry an improved weapon, quite as advanced in proportion to the old horse-pistol as the breech-loader is to the old musket. The revolver is apparently the most deadly weapon that has ever been invented. The sword, lance, carbine, long rifle, or cannon, do not have the same murderous effect. The reasons for this are numerous. In the first place, it is only used at short range, when men are mingled together in close fighting, and most of the shots tell. Then it is not a weapon requiring care and steadiness in aiming. The man merely looks at the object and pulls the trigger, and the sympathy between the hand and eye is much more likely to carry the ball straight, than an attempt at mechanical and mathematical precision of aim under fire, when men do not distress themselves with too much accuracy in bringing the two sights and the object into a right line.

Again, in close fighting, the revolver's bullet cannot be warded off like a sword or lance thrust. If it strikes, the wound is severe. It does not require the speed or weight of the horse to give it impetus, as does the lance, or the perfect training of the charger, which is necessary for an effective use of the sabre when mounted. Again, it reaches farther than sword or lance, and men armed with these weapons might easily be shot down, before having an opportunity of getting near enough to use them.

The experience of the past ages has certainly been that cavalry which used the pistol would invariably be defeated by cavalry which charged boldly on with the sabre. This is easily explained. The flint-lock horse-pistol formerly in use had a very short range, and was undoubtedly a very inefficient weapon. It was, in fact, comparatively worthless, for the shaking of the horse was apt to derange the powder in the pan, or the flint might miss fire, or the fire not reach the powder, and even when it did go off, the chances were that the ball had shaken out, and if not, that it would not carry straight. In those days it may easily be imagined that a

body of troops depending on such arms in preference to good swords would certainly be defeated, and deservedly so.

But now, with revolvers, the whole features of the case are changed. These arms will carry from 200 to 300 yards, and comparatively good shooting can be made with them up to 75 or 100 yards, while in a *mêlée* they are most deadly weapons. It is manifest that the experiences of the use of the old flint-lock pistol with its single barrel, and the rules and traditional maxims based upon them, are not applicable to anything like the same extent, in reference to the long range, sure-firing, repeating pistol.

The sword has not improved materially in twenty centuries, and therefore the vast improvements in the pistol must necessarily modify the views as to the relative merits of the two arms. The revolver was much used in the American Civil War against sword, carbine, and musket, and a few instances will convey some instruction, and serve to aid us in considering what prospect there is for cavalry of the future using the new pistol as an important means of success.

A fight took place in Virginia in November, 1864, between a squadron of Mosby's Confederate partisan cavalry, under Major Richards, and a squadron of Federal cavalry under Captain Blazer. After a sharp hand-to-hand fight, in which the Confederates used the revolver solely, the Federal squadron was completely defeated; the casualties were, on the Southern side, only one man killed and several wounded, but so deadly was the effect of the revolver, that Blazer's loss was *twenty-four* men killed, *twelve* wounded, and sixty-two prisoners and horses. This was in killed and wounded 36 out of 100—more than one-third—while killed, wounded, and prisoners comprised virtually the whole force.[1] The proportion of the killed to the wounded is an extraordinary proof of the deadly effect of the revolver.

Compare this with the fight at Egmont-op-Zee, on the 2nd October, 1799, between the English dragoons and some French cavalry, where two troops dashed into 500 victorious French horse, and after a *mêlée* drove them off. Then the 500 French returned and met at the charge the English reinforced by one troop; a second fight then ensued, and yet in both conflicts, the sword being used on both sides, only *three* English troopers were killed and *nine* wounded. In a fight of the same kind with revolvers how different would have been the losses!

At Heilsburg, June 18th, 1806, a fight took place between a division of French cuirassiers and two regiments of

[1] Scott's Partisan Life with Mosby, 371.

Prussian horse, in which it is said that a French officer came out of the fight with *fifty-two* new wounds upon him and a German officer received *twenty*. Imagine a man receiving fifty-two lance and sword wounds without loss of life or limb! How many shots would a man receive from a revolver before being placed *hors de combat?*

Again, take the account of the charge of Morgan's cavalry upon a Federal regiment of infantry at the battle of Shiloh, in America, in 1862. General Duke, in his history, says, "We came close upon them before the Federals fired. They delivered one stunning volley, the blaze almost reaching our faces, and the roar rang in our ears like thunder. The next moment we rode right through them, *some of the men trying to cut them down with the sabre and making ridiculous failures, others doing real execution with gun and pistol.*"[1] This is a remarkable testimony to the value of the revolver, and shows out another peculiarity of the American cavalry, that of combining dashing charges at speed with the use of firearms, for Morgan's men seemed to have used their pistols without losing the momentum.

General Stephen D. Lee, an officer of experience in the American war, says distinctly, "The sword has lost much of its effectiveness by the improved revolver, with which the cavalryman *will make the dashing charge with more confidence.* My experience was that the cavalryman was timid with his sabre in fighting against the revolver, and for the least excuse, will drop the sabre for the revolver. . . . . In every instance under my observation the revolver replaced the sabre with the *morale*, with the trooper, and against the enemy." "Again in the hand-to-hand conflict, which rarely occurs now (owing to the improved firearms), the *momentum* or *pluck* decides the affair before the eighteen rounds in hand are exhausted; and the *momentum with good cavalry is as readily obtained with the revolver as with the sabre*, my observation being that the sabre is timid against the revolver. The revolver is the all-important weapon with the cavalry man *in motion*, and is indispensable in his equipment."

This evidence of an officer of great experience is certainly entitled to weight, and it is particularly to be remarked that while he depreciates the sabre, and highly values the pistol, that he is also equally convinced that it should be only used as an adjunct to the momentum. In fact, he would use cavalry as did Alexander and Hannibal, merely exchanging the old arm for an improved and more deadly weapon.

Colonel Gilmor, one of the hardest fighters in the Southern

[1] Duke's History of Morgan's Cavalry, 150.

service, gives the same testimony in his "Four Years in the Saddle." Speaking of one fight in which he used his sabre, and successfully, he makes the remark, "*Had I drawn my pistols instead of sabre several would have fallen*, for we were at *close quarters*."

In another place he gives a most striking example of the value of the revolver. "We had nearly all got through a fence when I saw Kemp engaged with a powerful fellow, who was closing in upon him with sword upraised. Kemp always carried two pistols: in one he had but one load, that he fired at his adversary, but missed, then threw the pistol at him and struck him in the breast. The trooper closed in upon him before he could draw his second pistol, and seizing him by the hair, tried to drag him off the horse, at the same time lashing him across the shoulders with his sabre. Kemp held down his head and took it all, the while trying to draw his pistol. I had cut my way to him, and had raised myself with uplifted sabre to cleave the fellow's skull, when Kemp discharged his pistol into his stomach and he was free."[1]

Speaking of another fight where his men were all mixed up with the enemy, cutting and slashing at each other right and left, he says, "*Very few pistols were used, or our loss would have been twice as heavy*."

Major Scott's "Partisan Life with Mosby" also teems with evidence of the same nature. He refers to one fight of 100 of Mosby's men with about the same force of Federal cavalry, in which the Southerners used the pistols. The Federals were thoroughly defeated, with the loss of *twenty-six killed and wounded, fifty-four prisoners*, and eighty horses, while the Confederate loss was absolutely nothing. An account is also given of a Federal lieutenant with an orderly, who was surprised by a few of Mosby's men. With his revolvers he alone opened a fight, and in a few minutes had killed or wounded four of his assailants and driven off the remainder. Scott says, "Soon the gallant officer was master of the field. It was death to stand before that unerring pistol."

We have entered rather fully into the experiences of the American war, as to the use of the revolver by cavalry, as it is the only instance where that weapon was generally used on both sides, and it is important to gather all the information possible in striving to suggest some new scheme by which cavalry may improve to the utmost their chances of success.

[1] Gilmor, 235.

The Franco-German War however furnishes a most extraordinary proof of the inefficiency of the sabre as an offensive weapon. The German medical staff have lately issued a report upon the deaths and wounds inflicted by the various weapons upon the German troops. The losses of the Germans in the whole war of 1870–71, amounted to a total of 65,160 killed and wounded. Of these 218 only were killed and wounded by the sabre and clubbed muskets. Unfortunately the sabre wounds are not given separately, but assuming that these casualties were all inflicted by the sabre, the result is still most remarkable. Of the cavalry, 138 were killed and wounded by the sabre out of a total of 2,236. The most striking point of all however is the very small proportion of the killed to the wounded. The total killed by the sabre being, all told, only six!!—the wounded 212. In all the cavalry fighting at Wœrth, at Vionville, at Sedan, in the battles on the Loire, and in the Northern provinces; in all the outpost service, extending over almost half of France, the only deaths caused by 40,000 cavalry with the sabre, in six months' campaigning, amounted to six, while in the instances we have just mentioned—out of 100 men, Mosby's cavalry in one skirmish killed twenty-four and wounded twelve with their revolvers, and in another instance out of a similar number, twenty-six were killed and wounded in the same way.

The writer has heard the sneer made that the American cavalry would not charge boldly with the sabre, and that the reason they did not use that method of fighting was because they dreaded the cold steel. We would ask the reader which system, testing it by the results, is the most deadly, or requires the most pluck—that in which, in a paltry skirmish of a few minutes' duration, 24 men were killed out of 100, or that in use in the Franco-German War, in which the deaths from the sabre in six months' campaigning, amounted to an average of one a month, out of 60,000 cavalry?

For the cavalry proper we may fairly conclude that they should be armed with swords and revolvers. At present cavalry are only likely to be ordered to charge infantry when it is somewhat shaken and confused, and when the charge may be made to advantage. If the experience of the Franco-German War is to be taken as a guide, the infantry will receive the attack in lines, or if skirmishing, in groups which will fire steadily upon the horsemen to the last moment. This fire is certain to shake and disorder the ranks of the cavalry to such an extent that the horses can easily swerve past the groups and through the intervals, fully exposed all the way to the

fire of the infantry. On returning they would be equally exposed to tremendous losses. The chances are that the groups, if firmly held together, would, to a great extent, maintain themselves, and, unless broken, the losses they would receive in such a charge would be nothing.

Any groups that would be broken, any fugitives that would run to the rear, might, of course, be cut down by the cavalry, but otherwise the chances would be all in favour of the infantry. A charge in serried lines, well closed together, and moving on in perfect order, would probably smash through the infantry if they only rode on boldly. The troops of Frederick continually did so; but now the conditions are changed. Except under the most extraordinary circumstances, the cavalry would be exposed to fire for some hundreds of yards, and the losses of men and horses would naturally be so great, that the attack at the moment of contact could not be made in order, but would necessarily be in loose, shaken, and confused lines. Now, with the sabre alone, even when surrounding groups of infantry at close distance, how can the horsemen inflict much injury upon them? The blow could be received on the rifle, the thrust parried by it, the only real advantage would be that gained by the momentum of the horse and man moving at speed. This momentum, however, acquires no additional force through the sabre, and would be equally effective were the man unarmed. This principle was well illustrated by Colonel Shewell in the Balaklava charge. He returned his sword, and with a rein in each hand, led his men at full speed into the centre of the Russian horse. He was successful, forced his way through, and got off, although practically unarmed.[1] Adjutant Moore, at Bushire, in Persia, let his sword hang by the sword-knot, and, taking a rein in each hand, burst through the hostile square without being wounded.

Now, suppose that cavalry of the future in attacking infantry were to charge at full speed revolver in hand, each man taught to fire at the galop, and each man instructed that he was, without halting, to shoot a gap for himself in his own front, and so to effect an entrance: why should not this be a more effective system than riding up with the sabre?

Two or three shots from each man at within say seventy-five paces, should certainly cause some loss—distract the aim of the infantry, shake their formation, and lead the most timid to fall to the rear. Then suppose a hand-to-hand fight to ensue, would not the revolver be the most deadly of all weapons?

[1] Kinglake, ii. 560.

Careful training would produce cavalry that could fire with great accuracy with their revolvers at full speed, and as it will be readily admitted that horsemen intended for charging in the future must be thoroughly well drilled, there is no reason why this should not form an important portion of their instruction. And once the momentum could be secured, in addition to an effective use of the repeating pistol, would not a cavalry force be obtained that would be far more likely to break infantry than if armed with the sabre?

Great stress is laid upon the moral effect of the flashing sabres upon the minds of the foot-soldiery; but if we analyse this moral effect we soon come to the conclusion that the sabre itself has but little to do with it. Suppose the cavalry to come up at a slow walk, sword in hand, or suppose the cavalry to await the attack at the halt, how much influence would the sabre have on the minds of the infantry? Comparatively speaking, none. Suppose serried lines of horsemen in good order charging at furious speed with their swords in the scabbards, would there not be a great moral influence exerted by the rush of the advancing masses? And if the speed was maintained, would not the infantry shrink from the shock, more than from the attack of the horsemen, sword in hand, at a slow pace?

We are satisfied that the momentum is the great power after all, both moral and physical, and if to that the revolver with its deadly fire be added, the *morale* should be greatly increased. The great confidence of the infantry in their fire-arms would also lead them to fear the rapid volleys of the pistol more than the flashing of the sabres.

It seems therefore that if cavalry are to be used for charging on the battlefield against infantry or artillery, that all the arguments point to the advantage to be derived by organising, arming, and training the regular cavalry to use the revolver skilfully at speed, and to employ it at close quarters instead of the sabre. *The sabre should be maintained for use in the pursuit and in combats with the enemy's horsemen, where, through being able to attack without heavy losses in the advance, order might be better preserved and the sabre used to a greater advantage.* In the Confederate army they seemed to allow each individual soldier to use whichever weapon he felt most confidence in, and the result was that charges were often made where the men used swords and pistols side by side at the same time.

Any army that organises a force on this principle, if the men are only thoroughly drilled to appreciate that the firing should not slacken the rush of the charging squadrons, will

have a great chance of winning brilliant cavalry successes. The fear of the revolver bullets will shake the aim and render the losses lighter, while the horseman, having an effective weapon at close range, will instinctively hurry on to close quarters, knowing the advantage he will thus obtain. A few cavalry successes of this kind would improve the *morale* of one arm and depress that of the other, and then victory would follow victory.

A large revolver is also not altogether useless as a defence against the sabre. In the American war it was constantly used to ward a sabre cut or parry a thrust, as well as to pour in sharp and deadly discharges.

The more this subject is considered the more clearly apparent is it that great efforts should be made to secure the advantages of this splendid weapon to the cavalry service. This doctrine is of course rank heresy in the eyes of all the old-fashioned cavalry officers, who, reasoning solely from the past, uphold the sword because it has been the most successful weapon in the cavalry heretofore. But it is a blind following of precedent that alone supports this view. An intelligent consideration of the past history of cavalry shows that from time to time changes have always been made to suit the state of warfare of the age, and we hold that a change should be made now, and that cavalry intended for the battlefield should rely greatly upon the revolver.

So much for cavalry proper.

SECTION II.—MOUNTED RIFLES.

We have said that the cavalry proper should only consist of one-fourth of the mounted force of an army. The sphere of cavalry on the battle-field has so narrowed that it would be a mistake to maintain too large a force of a kind not likely to be much used. The light cavalry, however, intended for the minor operations of war, the force upon which the army should depend for information, for protection, for convoying, raiding, &c., will always have the most important and most vital services to perform in covering the marches and camps of the main body.

No student of military history can fail to have been impressed with the extraordinary influence which the operations of the light troops and outposts have always exerted for good or ill, as they have been either well or badly performed. The instances in the preceding pages are so numerous and striking as not to need reference. It may simply be said that perhaps nothing tended more to the defeat of the French

in 1870 than the wretched inefficiency of their horsemen as outposts, and the careful performance of that service by the German cavalry.

Again, speed in movement is one of the greatest elements of success in war. So much was the Great Napoleon imbued with this idea that he expressed the opinion that an army of 10,000 men which could average twenty miles a day would produce as great an effect on the success of a campaign as one of 20,000 that only marched ten miles a day. If this is true, and it is undoubtedly the correct principle, by placing 10,000 men upon horses they should be equal in value to 20 000 men. But we have seen that cavalry cannot defend a position, cannot even act effectively upon the defensive, that they cannot act on every description of ground, or attack entrenched positions; therefore, in most instances, these circumstances would detract from the value of the 10,000 men and counterbalance the effect of the extra speed. But if these men, on arriving at the point where they are required, can dismount and fight on foot as infantry, they can then be used on any kind of ground, and need not fear the danger of being cut off in case of being obliged to retreat. This fact led to the formation of dragoons.

When Alexander the Great was pursuing Darius we remember that he placed 500 of his best infantry on the same number of cavalry horses, and thus hastened on towards the enemy. Before his time chariots were used with somewhat the same idea. In later times the principle was revived, and dragoons formed for many years an important portion of armies. Napoleon had a good opinion of this force, he said that cavalry of all descriptions should be furnished with fire-arms and know how to manœuvre on foot.[1]

The value of a dragoon force able to move quickly to a decisive point, there to fight on foot, has been appreciated to a certain extent from the earliest periods. There have been causes, however, which for many years have led to this force being but little valued. The extraordinary successes of the charging horsemen of Frederick the Great threw the dragoon force into the shade, and led to the belief that the system was faulty. There were also many other weighty reasons which in past times prevented the full value being derived from this method of arming and employing horsemen.

Formerly battles being fought on open plains gave but little opportunity for dragoons to dismount to operate with advantage. Where the ground was open and level, in the then condition of the armament of the infantry, it was often

[1] Liskenne, vi. 356.

better for the dragoons to act as cavalry, and charge the infantry at speed; consequently, the dragoon regiments became, in most armies, simply cavalry, and were almost invariably used in that capacity. In fact, their equipment was not designed to enable them to fight on foot with advantage, and thus the dragoon principle had fallen into disfavour.

In this matter also we must be guarded against prejudices which are based upon difficulties which existed under the former state of the military art, especially if those difficulties do not exist at present, or may be remedied. The dragoons, except in the American war, were formerly armed with the old-fashioned smooth-bore carbine, a weapon of contracted range and uncertain aim. In former wars, when so armed, the infantry also being armed with the clumsy musket, battles were fought in a very different method to that in which actions are now contested. In the time of Frederick the Great and Napoleon, the short range of projectile weapons caused the armies to be drawn up close together at the commencement of the action, and the stress of fighting began practically with infantry, at the close range of about 300 yards, and continued up to 40 or 50 yards, and often to the shock of bayonets, before the victory was decided and one side fell back. Now, however, the circumstances of the case are very different. In the Franco-German war the firing of the infantry lines against each other often commenced at the distance of 1,500 paces, and they rarely came within 200 paces without one party giving way. In fact, the real zone, so to speak, in which infantry actions were usually decided, and the sharpest musketry fire took place, was from say 600 down to 150 paces, the crisis of the fight being generally at about 400 paces. We see therefore that, with the present weapon, a defending force can commence to annoy an approaching enemy at over 1,000 paces, the fire increasing in effect gradually, until at 600 paces it becomes very deadly, and for that whole distance an advancing force would be subjected to terrible losses.

Adding the rapidity of fire, and certainty of aim, to this long range, we find that the zone in which infantry actions are fought, or to speak more accurately, the dangerous zone in which musketry fire is effective, is not only increased from about 250 yards to more than double that distance, but that the number of missiles discharged in each hundred yards of the zone has been quadrupled, and with more accuracy, and greater power of penetration.

Bearing all this in mind, we can see that under the old system of warfare, dragoons dismounting to defend a position,

and placing their horses under cover, say 100 or 200 yards to the rear, would only have an opportunity of making an effective fire at short range, and in case of a rapid and vigorous attack, would only be able to fire a very few ineffective rounds before the infantry would have crossed the narrow zone, in which alone their arms could inflict any damage. Again, in those days the action was not decided either way until the opposing forces had come to close quarters, often even to the shock of bayonets. Supposing, then, the dragoons to be overmatched and obliged to withdraw, if they retreated to the horses when the enemy were close upon them, they would be caught in the instant of mounting, and badly handled. The fear of this would lead them to break for their horses too soon, and they would often consequently be defeated from that cause.

Now how different are the conditions of such a fight! The dragoons, or mounted rifles, can place their horses in the rear, and taking up a defensive position, can begin to annoy at 1,000 paces, to inflict loss at 600, and after that to pour in deadly volleys, so that the action can be decisively settled before the approaching enemy would come within 200 yards. There would be nothing to prevent mounted riflemen, provided their horses were under cover, say in a wood, or behind a village, to remain fighting until the enemy were within 150 yards, and then run to their horses and mount, and gallop away in case of being overmatched.

It will be at once admitted that the modern weapons and system of fighting have given an opening for the use of mounted rifles, such as that arm never had under the old method of armament. The much greater breadth of the zone of fire, the great increase of the distance at which the result is now decided, has completely revolutionised the conditions under which dragoons used to fight. The time taken by the dismounted horsemen, in case of defeat, to regain his horse has not been increased, while in the future the time he will have to accomplish it in will be quadrupled. The power of his weapon, dismounted, both in range, rapidity of fire, and execution, has been also marvellously increased. It is folly of the worst kind to apply the maxims based upon a certain condition of affairs, and to act upon them, when the conditions which alone gave force to the maxims have been reversed or done away with.

This is not mere theory. Who that has read the accounts of the mounted riflemen in America can deny their great usefulness and efficiency? The horsemen in that country could perform outpost duty with wonderful ability—they

could dismount and fight in line of battle against infantry, cavalry, or artillery; they could attack fortifications, capture gunboats, storm stockades, in fact, do anything that could be expected of soldiers. And it is marvellous that the Prussians or French had not adopted the idea, and used it in 1870-71.

Does anyone believe that the Germans have not learned a lesson from the experiences of the latter part of the war in France, when the *franc tireurs* compelled the celebrated Uhlans to march under the protection, or with the support of infantry? The lesson then taught should not be lost. The chances are that in the next European war, whichever nation employs the mounted rifles extensively will be found winning decisive campaigns by the wise adoption of a necessary reform. In fact, at this moment the Germans are arming a large proportion of their cavalry with long-range carbines, with the object of enabling them to act as mounted riflemen.

Another great advantage in mounted rifles is, that if accompanied by light artillery, a movable army is secured, which with the rapidity of movement of the best cavalry combines the power of acting on every description of ground, either offensively or defensively. This makes this force the best suited for outpost duty, for which it should be specially trained. The men should be taught to dismount and manœuvre on foot, three men of every section of four dismounting, the remaining one taking care of the horses. Number three of each section should hold the horses, as he would have one on his left side and two on his right. Great care should be taken to practise these men to move about, advancing and retiring with the horses, so as to secure cover, to follow the advance of their dismounted comrades, and to move rapidly up, in case of a necessity for remounting the whole force.

A mounted force of this type would be useful in every situation, and particularly on detached service. General Stephen D. Lee, already quoted from, says: "The equipment of the cavalry man with the recent repeating rifle, and revolvers of modern invention, in my opinion has increased his efficiency, proportionally, more than either the infantry or artillery arm has been by the inventions applicable to those arms. It enables the commanding general almost to detach an army corps of infantry with the celerity of cavalry, for an important blow at a distance, or even on an extended battle-field for a critical flank." "A large body of cavalry, as now armed, is a match for almost any emergency, it is an army in motion, and on a flank its blow is terrible, and against communications, magazines, &c., its damage disastrous."

CHAPTER XXXIII.

ARMAMENT AND EQUIPMENT.

I.—HEAVY CAVALRY, OR CAVALRY OF THE LINE.

THIS force should be composed of powerful men on strong horses, and should be trained to the greatest possible steadiness. The arms, as already mentioned, should consist simply of two revolvers and a sabre. One revolver should be carried on the person, the other on the horse.

As to dress there are a few general points that may be mentioned. The uniform should sit close to the body, but not too tight, in order to give perfect freedom to the use of the limbs. A light metal helmet is the best headpiece, and a good protection against a sword-cut. Cuirasses, to be a defence against modern arms, would have to be so heavy that men could hardly carry them, and unless bullet-proof they would be injurious rather than otherwise. As speed is important in getting over the dangerous zone of fire as quickly as possible, the cuirasses should be abolished, and light chain shoulder-straps as a protection against sword-cuts, and gauntlets, with light steel bars to the elbow, should be the only species of defensive armour.

Jack-boots reaching to the knee are also very useful to horsemen, as they keep the feet dry, protect the legs somewhat in the crowding in the ranks, and when pulled off at night enable the soldier to sleep comfortably, with dry trousers around his ankles, which could not be the case with the leather-covered overalls used in some armies.

Cavalry so equipped riding with pistols against an opposing force of cavalry armed with sabres would be almost invulnerable, while able themselves to inflict fearful losses. The helmet would protect the head, the chain-[illegible] shoulders, the jack-boots the legs, and with a [illegible] and the revolver in one hand, the chance

horsemen coming out of a *mêlée* with swordsmen without serious injury would be very great.

The losses inflicted by the sabre, even when the opposing parties are closely mingled together, often astonish one by their trifling nature. Colonel Von Borcke, in his "Memoirs of the Confederate War," gives an account of a night surprise, in which two Southern cavalry regiments charged through each other by mistake. He says "The 1st and 3rd Virginia, under this mutual delusion, had charged through each other in a splendid attack before they discovered their error, which was fortunately attended with no worse consequences than a few sabre cuts."

Every care should be taken to cut down the luggage of cavalry men to the lowest possible point. They should carry but little more than is upon their backs, reserve supplies of clothing being kept in waggons far to the rear. The men should not be allowed to carry their valises on their horses while campaigning, as they would be sure to be filled as full as possible, and the horses would suffer.

Dragoons and cavalry should have a long overcoat, or cloak with sleeves, split up a little behind to spread on the horse, and made so that the belts might be worn over it in case of need, as well as under it. The cloak without sleeves is very awkward and clumsy.

Hozier, in his history of the war of 1866, speaking of the dress of the Prussian soldiers, makes a remark which strongly supports the idea of not allowing the cavalry to carry valises. He says that the Prussian infantry were "weighed down by their heavy knapsacks, which, although of a better construction than those of most armies, *were hardly required, and though present were seldom looked into* in the actual campaign. Railways and improved roads have made great alterations in the necessities of a warrior, both by shortening the duration of campaigns and facilitating transport." "Soldiers need no longer be weighed down by heavy loads upon their backs, held back from their real use, marching and fighting, to be converted into beasts of burden.[1]

This applies with equal if not greater force to the cavalry, whose speed and endurance constitute their great value.

II.—LIGHT DRAGOONS, OR MOUNTED RIFLES.

This force should be dressed more lightly than the other, and do not require the helmet or gauntlets, as every point must be considered will tend to render them effective

[1] Weeks' War, 445.

dismounted. A light head-dress, fitting close to the head, should be used instead of the helmet, as the mounted riflemen may often be obliged to skirmish through woods and broken country. The boots should be worn outside the trousers, but might be lighter than those of the heavy horsemen. The carbines should be carried in a bucket on the saddle behind the right leg, and it would seem as if a weapon somewhat larger than the ordinary carbine would be the best kind of arm for this force. The infantry long rifle is not suited for use on horseback, as it is too large and clumsy. A medium might easily be secured between the two. This carbine should be a breechloader, not a repeater.

A revolver should be carried on the waist-belt as a reserve weapon for close quarters, either mounted or dismounted, while a sword might be attached to the saddle to be used only when mounted, and then only in case of failure of ammunition or some other contingency. It might be available, for instance, in a pursuit when the enemy were broken and flying. In the Confederate army many of the mounted riflemen had no swords at all.

The sword should not be attached to the man, as it is a most troublesome encumbrance to a rifle skirmisher when dismounted. In fact the sword, the high shako and plume, the tight strapped trousers, and the spurs, all combined to make the old-fashioned dragoon when on foot as useless and clumsy a foot-soldier as could well be conceived, and was one reason of the failure of the dragoon principle in the past.

It was extraordinary that this was not remedied formerly, for the sword is a weapon of but little use dismounted. The carbine should rarely if ever be fired from off the horse's back, for any mounted charging should be done with the revolver or sabre. The same arguments in reference to cutting down the weight carried to the lowest possible point, apply with equal if not greater force to the mounted riflemen, upon whom should devolve all the detached service.

This force should also carry among them a few small axes or hatchets, attached to the saddle in leathern cases. There should be a few in every troop, for they are required for breaking down fences, making breastworks, cutting wood for fires—making huts and shelters, cutting down telegraph poles, &c. As it is absolutely necessary that cavalry should always have axes with them, it is better that some of the men should carry them, rather than that they should be carried in waggons.

This force being mainly employed for outpost and detached service, should be composed of intelligent men, and should be

plentifully supplied with maps of the seat of operations, which all the non-commissioned officers should understand how to read and use.

With reference to the horses it may simply be said, that the heaviest and most powerful horses should be given to the heavy cavalry, while the lighter animals should be given to the dragoons. It must also be remembered that the value of cavalry of any kind depends mainly on the horses, and that every effort should be made by careful feeding, shoeing, saddling, &c., to preserve them in a good condition.

It is the strength and lasting qualities of the horse which make the mounted man formidable. The animal should not be made therefore to carry unnecessary weight. And all cavalry officers should bear this point in mind.

CHAPTER XXXIV.

EMPLOYMENT OF CAVALRY IN A CAMPAIGN.

ALTHOUGH the sphere of cavalry on the battlefield has undoubtedly been much narrowed, it is a question whether its use in the other operations of a campaign is not likely to be much enlarged in the future. The great power which the new firearms give to the mounted riflemen have increased their effectiveness so materially as to enable them to be usefully employed far oftener than under the old system.

The railway, telegraphic, and other communications of an army are so important, and so essential to be preserved, that a force of horsemen are as necessary to guard them as they are useful to threaten and attack those of the enemy. A large force of mounted riflemen, accompanied by a few pieces of artillery, can almost live on the country, and by the rapidity and secrecy of their movements, can avoid and escape large bodies, while, from their armament and fighting capacity, they can either attack smaller forces or defend themselves if assailed.

At the opening of a campaign these horsemen should be sent on as outposts or advanced guards. They should be under a general of cavalry, and should be instructed to push boldly on in an impenetrable line, strong but flexible. This belt of horsemen, self-reliant, able to defend or to attack, not to be checked by small parties of infantry under cover, should sweep forward, feeling the whole country on the way, and moving on until the enemy's advanced posts are struck. Once this is done the touch should never be lost. A firm pressure should force back the weak points, a stern resistance should hold in check the strong points, and without much risk, the position and strength of the enemy should be pretty well ascertained.

There is nothing to prevent a force of this kind pressing on two or three days' march in front of the main army, which, moving in perfect security behind it, would march comfort-

ably, with greater ease, and without fear of surprise. Cavalry also, marching faster than infantry, should naturally be in front, and if at a good distance, could be kept more scattered, and consequently healthier and better fed. In fact, it seems waste of words to argue in favour of this principle. Experience has shown it always to work well. The Austrian horse against Frederick the Great took up the touch of his posts, and pressing them closely, never lost the hold of them as, for instance, notably at Sohr and Hochkirch. The Cossacks against Napoleon worked the same way. The Germans in 1870 moved covered by horsemen far in advance; but as soon as the *franc-tireurs* were organised the equipment and system of fighting of the Prussian cavalry rendered them almost useless against foes who must have been contemptible in themselves.

Small scouting patrols should be used very freely; in fact, the whole front and flanks of an army should be swarming with them. They form the antennæ, the feelers, of an army. They are the eyes, the ears, and often the feeders of the force. A general without good cavalry gropes his way in utter darkness, is as a blind man, moving slowly and with indecision, not knowing where to strike, or where to expect a blow.

The genius of Frederick the Great, the marvellous skill and steadiness of his wonderful army, and the extraordinary ability of his leading generals, barely enabled him to issue successfully from a struggle where the most important element against him, was the force of irregular light horsemen that swarmed around him. Napoleon, after conquering almost the whole of Europe, succumbed to the same cause.

Cavalry officers should bear this in mind; should be deeply impressed with the heavy responsibility that rests upon their force, to acquire information of the enemy's movements, to hide the dispositions of their own army, and to secure them carefully from surprise. This duty the cavalry, armed as mounted riflemen, can now perform with efficiency, and with much greater boldness than ever. They need not wait for infantry supports to come up to clear an obstruction, they need not retire for want of an infantry force to defend a position. In fact, in the wars of the future the horsemen should shine out more brilliantly than ever.

So much for the way in which the cavalry should be thrown to the front to cover an advance. That is one portion of their duty. Another important one is to make great raids upon the enemy's communications. There is no need to enter into details, but we may simply refer to the raids of Stuart, Forrest, Morgan, Wilson, and Grierson, as

good illustrations of the use that mounted riflemen can be put to in that way.

In the battlefield they might be used for turning movements around a flank, especially as the direct attack in front will in the future always be attended with such serious losses. In defensive battles they could also be employed in line of action dismounted, their horses well to the rear, in which duty they should be as capable of fighting effectively as the best infantry. Forrest's men did this at Chickamauga, and after the victory mounted and took up the pursuit.

Again, if the charging with the revolver turned out successfully in practice, the mounted riflemen, with their pistols, should be able to make mounted charges almost as well as the heavy cavalry. They would certainly be able to act effectively in support, and should be able to give most valuable assistance in a cavalry fight. The American cavalry fought well on foot, and charged boldly when they had the opportunity mounted, and there is no reason why they could not do so.

After the battle, in a pursuit, the mounted rifles would then be of the greatest value. Not by direct attacks in rear, but by wide turning movements to intercept and cut off the retreat. The operations of Sheridan, in the retreat of Lee's army in 1865, are detailed fully in the twenty-eighth chapter, and form the best illustration of this method of pursuing a beaten army.

CHAPTER XXXV.

MORALE.

THERE is one influence of the highest importance, which the cavalry officer should thoroughly understand and always bear in mind, and this is the *morale*. Napoleon fully appreciated the value of it. He said that "the moral" in war is to the physical in the ratio of three to one. There can be no doubt as to the correctness of this principle, for the *morale* of the soldiers has always exerted more influence upon the result of battles than the mere physical force.

At the present day, however, when men do not fight at close quarters, but with deadly weapons at longer distances, the physical force is rarely or never brought into play; never, in fact, in the infantry, and only rarely in the cavalry. Now, therefore, the moral effect is what decides battles, and the art of war resolves itself into the art of improving the *morale* of your own men, and depressing that of the enemy.

Take, for example, two lines of infantry marching towards each other. They will never close, and the greater physical power of one line press back the weaker force of the other: but first one will waver, then halt, and finally fall back, with a greater or less degree of order according to the courage or discipline of the troops. In the same way, cavalry charging infantry will often turn on receiving a volley in their faces. It is not the physical force of the volley which does this, because those who turn are not those who are struck, but the mere moral effect on the minds of the men produces the result. There is, in fact, no limit to the successes which will be gained by forces with a high *morale* over extraordinary odds, where their opponents are in a demoralized condition.

It was moral force, not physical, which led to the successes of the handful of troops under Cortez and Pizarro against the myriads to whom they were opposed. A more remarkable instance was the Indian mutiny of 1857, when the sepoys, armed, trained, organized, and maintained, exactly in the

same manner as the British regulars, were defeated by the English troops over and over again, although their superiority in numbers over the latter was enormous.

The elements which contribute to the *morale* of soldiers in battle are almost innumerable, and every officer should pay the closest attention to this point. Confidence in their commander is one of the most important points in securing a high *morale* in troops. Stonewall Jackson in the American war had so won the confidence of his men that they could not be defeated when he was in command, and the enemy was so demoralized when before him, that fugitives from the front line calling out "Jackson is coming," have spread a panic among the reserves without their even having been under fire.

Winning the first success in a campaign is another most important consideration, and its effect will be felt all through a war. This can be seen strongly marked in history from the earliest times. Taking the initiative is another good method of encouraging the soldiery. Cavalry should always bear this in mind, and remember that the boldest and most dashing course is almost always the best.

Napoleon says, "The worst plan to adopt in war is always that which is the most pusillanimous, or commonly called prudent, and that true wisdom consists in energetic resolution." This is the wisest of all Napoleon's maxims. The more one studies military history, the more he will become convinced, that the first great quality of a general is a sound judgment, but that the next is an indomitable energy, and an iron will; without this the best judgment in the world is worthless. Energy, indefatigable, indomitable energy—is perfectly invaluable in a general, and a cavalry general requires it most of all.

Stonewall Jackson possessed this quality in a very high degree. His impetuosity enabled him to move his command, consisting mainly of infantry, at such speed, that his corps received the nickname of the "foot" cavalry.

In one critical period in the army of Virginia, one of General Jackson's staff expressed his fear that the army would be compelled to fall back. The general replied sharply, "Who said that? No, sir, we shall not fall back; we shall attack them." And he did attack them, and defeated them completely at Chancellorsville in a day or two afterwards. His only order after getting his men into position was his favourite battle-cry, "Press forward"—this was his message to every general, and his answer to every inquiry. When he was mortally wounded after dark, his only message to General

Lee was that "the enemy should be pressed in the morning." It was this indomitable will and fiery energy that improved and strengthened to such a remarkable degree the *morale* of his men, and so demoralised his opponents.

Arrian refers to the demoralisation in the army of Darius the night before the battle of Arbela, from long watching and fear, which, as he says, "was firmly *rooted in the hearts* of many of them, and made cowards of them." He says this contributed not a little to their overthrow.[1]

Rostopchin, Governor of Moscow in 1812, adopted a curious plan to encourage the *morale* of his men. He caused the most diminutive of the French prisoners to be selected, and publicly exhibited to the people, that the latter might derive courage from the sight of their weakness. This was a happy expedient, and could not fail to improve the *morale* of the troops.[2]

The influences which affect the *morale* are so numerous, so varied, that it is impossible to do more than just touch upon the subject here. There is no doubt, however, of the enormous importance of studying the feeling closely, and using every effort to preserve it in an active condition in the minds of the soldiery.

[1] Arrian, book iii., chap. xi. [2] Segur, ii. 21.

CHAPTER XXXVI.

THE GENERAL-IN-CHIEF OF CAVALRY.

La Cavalerie paraît, de toutes les armes, la plus difficile à manier.
—JACQUENOT DE PRESLE.

ALTHOUGH good officers of infantry, as well as efficient commanders of artillery, are found at all times in all armies, there is nothing rarer than a perfect general of cavalry. The several arms are so distinct in composition, armament, and method of fighting, that the leaders of each require different talents and dispositions.

The cavalry commander requires the rarest combination of talent. He must have the great prudence which is always required in an officer holding a responsible post; and at the same time he must possess extraordinary rashness and bravery, and combine the greatest calmness with the greatest impetuosity.

For with cavalry the greatest prudence must be used in the conception of a plan, the greatest boldness and impetuosity in the execution of it, the greatest calmness in retreating under disaster, and the greatest caution in pursuing in the event of success.

It is necessary that a commander of cavalry should strike with the impetus of a thunderbolt, that hesitation should be a word unknown to him. But in the wild rush of the cavalry charge, in the excitement of the headlong pursuit, in the fury of the swaying *mêlée*, with sabres flashing, bullets hissing, and revolvers plying death and destruction around, then the cavalry commander has need of all his calmness. He must think quickly, and act promptly, and the rare talent that enables a man to control and direct with judgment the movement of charging horse under such conditions, is what makes the great cavalry general. No wonder that so few have appeared upon the pages of history.

All celebrated cavalry officers have been noted for the zeal,

the impetuosity, the fire of their dispositions, and they have excelled each other only in possessing to a greater degree the caution and prudence necessary to a responsible command. There may have been cavalry officers of reputation who have altogether lacked the caution, but there never was one with the slightest claim to the name who lacked the energy and the impetuosity.

In commanding the advanced posts of an army the cavalry general cannot exhibit too much caution, and here the caution requires the exercise of the most restless activity. When before an enemy every imaginable road and by-path should be watched and patrolled, every possible point examined, every conceivable precaution against surprise taken. In pressing on to search out the position of the enemy nothing should prevent the most extreme boldness. In fact the general principle should be laid down that the boldest course is always the best. The well-known writer, Archdeacon Denison, of Taunton, says in one of his writings, "I cannot abide that nasty, mean little virtue commonly called prudence." That one sentence indicates that he would probably have made a good cavalry officer.

Another requisite quality of a cavalry commander is the faculty of divining by intuition from the slightest signs the designs and intentions of the enemy. General Shelby, who commanded the Confederate cavalry in Missouri in the American Civil War, seems to have been naturally qualified for a cavalry commander. His cautiousness in picketing, patrolling, and guarding against surprise was almost a mania, and without parallel. His boldness in never retiring before an enemy without fighting was equally marked. Whenever reports were brought in of an advancing enemy his question always was, "Did you see them?" If this was answered affirmatively, he immediately followed it up with, "Did you count them?" "No, General." "Then we'll fight them, by Heaven! Order the brigade to form line, and the artillery to prepare for action front." Thus he never turned his back upon an enemy without knowing his exact power, and without inflicting more or less injury upon the advancing squadrons.[1]

This is the spirit in which cavalry should be handled. In guarding against surprise, in taking every conceivable measure to insure success, the caution should almost approach timidity. In boldness and reckless daring, when the time for action comes, the rashness can hardly be excessive.

[1] Edward's History of Shelby and his Men, 80.

A general of cavalry should have unbounded fertility of resource, should shake himself free from the trammels of routine and red tape, and adopt his measures intelligently to suit the varying contingencies of actual warfare.

Long peace training, upon rigid and inflexible rules, has always had its influence in narrowing and contracting the natural powers of the officers. Men are taught with great care the routine of elementary drill, field movements, &c., on rules laid down with mathematical precision. This is all very well as far as it goes, but the training should not stop there. By this system the faculty of thought is never exercised, the power of reasoning never brought into play. Stolid obedience of orders, and a rigid adherence to routine and red tape, are considered in many armies as the highest type of military discipline and the best evidence of efficiency.

The effect of all this upon the intellect has never been properly appreciated. Officers living all their lives in an atmosphere where the repetition of apparently unmeaning duties forms the every-day occupation, where rule and line have laid down in advance the manner of performing every minute detail, cannot acquire that decisive, vigorous promptitude of judgment and fertility of resource so necessary in the ever changing conditions of active operations. The greatest natural talents must certainly feel the depressing and rusting effect of want of exercise.

No system could be more ill judged. One might as well teach a child his alphabet, teach him every letter and its pronunciation, make him go over it day after day and year after year, and then on examination expect him to read without ever having taught him to spell, as to make officers repeat manœuvres year after year, and expect them, by inspiration, to know how to apply them practically in the ever-varying contingencies and trying straits of actual war.

The effect of this system was clearly apparent in the English army in the Crimean War. Lord Cardigan and Lord Lucan were officers of this type, trained in this narrow school. We have already seen how the English cavalry blundered off on a wrong road in a single line, in blind adherence to routine, and, as advanced troops, were about as useful to the army as if they had been in China.

Again, in the cavalry action at Balaklava, we have seen Lord Cardigan and the light brigade sitting on their horses, idle spectators of a fight in which the enemy's flank was exposed to a direct attack. Kinglake, speaking of this extraordinary inefficiency of the English cavalry chief, makes the remarkable statement that, "supposing the natural

capacity equal, there is no stirring missionary, no good electioneerer, no revered master of foxhounds who might not be more likely to prove himself equal to the unforeseen emergencies of a campaign, than the general officer who is a veteran in the military profession, and at the same time a novice in war." [1]

The Prussians long ago felt this weakness, and though their discipline is strict, by their system of autumn manœuvres they train their officers to think, and accustom them to act upon their own responsibility to such an extent, that it is probable no campaign was ever fought in which the corps and divisional commanders acted more upon their own responsibility than in that of 1870.

It is curious and interesting to note that this weakness in the military profession is as old as the history of the science of war. Xenophon, one of the very earliest writers on the subject, gives an account of a conversation between Socrates and an Athenian youth, who had attended the lectures of one who taught the military art. Socrates asked him how the professor began to teach him generalship. "He began," replied the youth, "with the same thing with which he ended, for he taught me tactics and nothing else." "But," said Socrates, "how small a part of the qualifications of a general is this!" And, after mentioning various qualifications, he went on to say, "But did your instructor teach you to arrange an army merely, or did he tell you for what purpose and in what manner you must employ each division of your forces?" "Not at all," replied he. "Yet there are many occasions on which it is not proper to draw up an army or to conduct it in the same way." "But, by Jupiter, he gave me no explanation as to such occasions." "Go again then by all means," said Socrates, "and question him: for if he knows and is not quite shameless he will blush, after taking your money, to send you away in ignorance."

In addition to all the other faculties, a cavalry general should be possessed of a strong inventive genius, and be self-reliant enough to strike out a new line and adopt reforms where he sees them necessary. We have seen in the whole progress of this work how reformers have arisen from time to time, and how their successes have almost invariably been attributable, to a great extent, to the inventive genius that has been one of their distinguishing characteristics.

Alexander the Great invented the impetuous attack with horsemen, and was a reformer to that extent, and the new and unaccustomed tactics aided him greatly in winning his

[1] Kinglake, ii. 484.

victories. Hannibal's dependence on horsemen, and the skilful method in which he employed them, was a surprise to the Romans, and won him many successes. Scipio Africanus imitated and improved the system, and beat Hannibal with his own weapons. Henry the Fowler was another instance, the Black Prince another, both men of inventive genius. Turenne ingeniously adapted his plans to the nature of the battlefield, and that was an invention also as far as he was concerned. Gustavus Adolphus and Frederick were both either original inventors, or they applied old ideas with a skill that gives them equal credit; while Napoleon astonished the world by a system of strategy and tactical employment of all three arms, which was almost perfection under the then existing conditions of the art of war.

It is impossible to point to a great commander in history who was a blind follower of precedent. The great men have always made changes to suit the conditions of warfare at the time. Improvements in arms and the various inventions which affect social life, such as steam, telegraphing, &c., all have their influence on the military science, and the best general is he who can ingeniously secure the greatest results from the material at his command and the circumstances in which he is placed. The cavalry general of all others should be imbued with this idea, and should use every effort to gain every possible advantage for his branch of the service.

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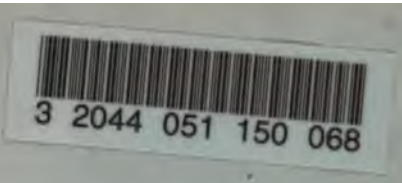

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